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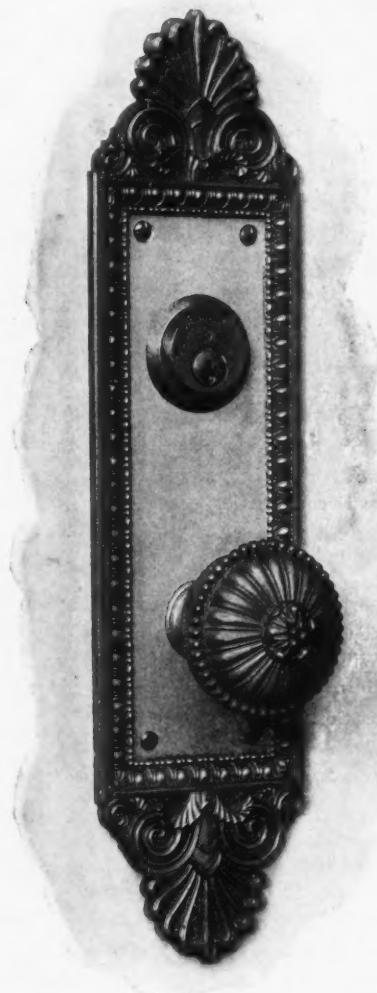
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Architectural Record.

VOL. VIII

OCTOBER-DECEMBER, 1898.

No. 2.

NOTABLE BUILDINGS.—No. I. THE VILLA LANTE.

THE few miles intervening between Viterbo, that venerable town of many fountains, and the village of Bagnaia, with its mediæval squares and its one main street, is rarely traversed for the sake of the little town itself, although it is attractive as all Italian hill towns must be. At the end of the village lies the old estate of the Bishops of Viterbo, now the home of the Duca di Lante, usually attracting students of art and architecture from the main route, but seldom the more general traveller, who, on visiting Viterbo, has Rome or Florence as an immediate destination.

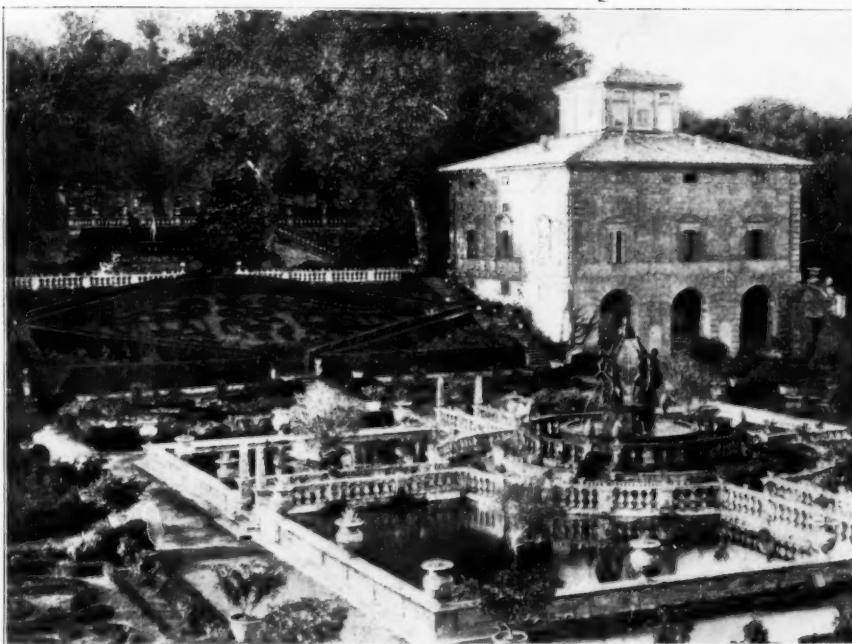
Yet they who visit the Villa Lante find something unknown at Florence, and unequalled in Rome. Around the latter city, on the hills by rushing torrents or on the border of mountain lakes, are towns filled with the old houses of Popes and Cardinals and Princes, some situated in the midst of their own groves and vineyards, many with their backs to the Alban hills, face Rome with that view over the vast blue campagna; all are set in a grand, natural position, and none in a spot where man has had to form the great characteristics as at the Villa Lante.

It is not alone a perfection of natural site or conventional works that render an Italian villa of this type successful, nor even the admixture of both, unless the unison be so deftly accomplished as to leave in the mind of the beholder no idea of imperfect unity.

A mediæval castle, with its far-reaching view for friends or foes, was perfectly situated on its rugged height, springing from the midst of the wildest forest; and a Roman villa of the first and second centuries was wide set in its small garden, devoid of all natural beauty, where all foliage was forced into forms never prescribed by nature. But the architects of the fifteenth and sixteenth century villas had neither the problem of the former or the latter, but were forced by the very nature of these summer homes and the times into a modification of both.

The architecture of this period exhibits buildings of various forms, but the great ones always indicate their purpose and that they were considered as units, not as a collection of separate parts. As a composition such was the result attained in the gardens of the Lante. And it is far more evident here than in other Italian villas that this was the result sought, and that it was never for a moment forgotten or undervalued. In ornamental gardens, as in buildings, it is evident that if the composition is good the result is a production of some worth, and that detail is of lesser importance, increasing the harmony of the result, however, as the detail becomes more fitting in its application and in its own beauty. In the Villa Lante such parts are not only beautifully designed but wisely used, and from the grand fountain in the lower garden to the source in the upper terrace there is an impression throughout of unity and ideal beauty in which minute study discovers but few faults. The general plan of the villa, except the surrounding park and woodland, is long and narrow, the length stretching away from the entrance, upon passing which the arrangement of the gardens is at once made plain; and it is upon this basis that the scheme of the fountains, terraces and colonnades has been formed. From the lower level of the entrance and main garden rise terraces in four different levels, each connected with the other by flights of steps, flanked by colonnades, each terrace having as a central motive either a fountain or a course of water, all so placed and arranged as to fulfil their own part without interrupting the main scheme.

Although the villa displays established precedents, it has by no means the traditional formality, and although prominence is given to the main features, they have not been unduly developed. There is no superficial display of or attempt at vulgar ornamentation. The lower garden, approximately two hundred and fifty feet square, is surrounded on three sides by a hedge of box of magnificent growth; the centre is occupied by the grand fountain; four lions of bronze are seated between bronze figures of nude youths, standing beautifully poised over a circular stone basin; the water is thrown aloft in the centre, and from the lions' mouths to the water below, whence it finds its way through masks in the pedestals of the stone balustrade to the second surrounding basin, and finally on through lions' masks again to the great pools below, which are surrounded towards the centre by balustrades, but on the garden sides are bounded only by a low coping level with the water. The effect of this great motive, a hundred feet square, is charming beyond description; nothing could be more effective, or yet fill so large a space more simply. The basins, balustrades and stone vases and covers are of a coarse porous stone, now moss-covered and beautifully worn by time and the water, all well designed and in excellent har-



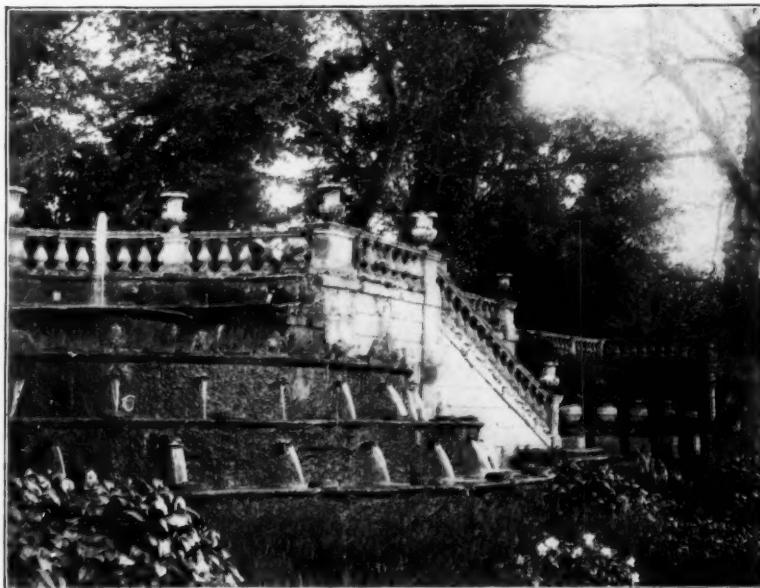
THE GRAND FOUNTAIN AND TERRACE, FROM THE ENTRANCE.

mony, and the bronze figures are far above the average sculpture usually devoted to this purpose. The garden surrounding this fountain is laid out in four great blocks, or rectangles, and four small ones, all consisting of box and laurel, all having in the centre, on a level with the ground, circular basins, with one low, central jet of water. These rectangles are emphasized and defined at the angles by pedestals supporting great terra cotta vases containing lemon or orange trees, the fruit of which is the only bright color. All is subordinate to the main tone, green, just as all minor arrangement in these blocks is kept subordinate to the form and placing of the blocks themselves. The end of the garden opposite the entrance is occupied by the two buildings forming the residence; between them the ground rises in a steep incline, a balustrade at the top and a hedge at the sides and bottom, the higher level being gained by flights of steps against each building. The first terrace thus reached is planted with a dozen noble trees, spaced with a regularity that leaves the view of the upper terrace from the open loggie unimpaired. At the end of this terrace and on the axis is a circular fountain of four simple concentric basins, rising one above the other, with a single central jet in the highest, the water flowing not over the rims, but through bronze bills in the sides. On either side steps lead to the next level. Low pedestals with stone vases con-



CENTRAL GROUP OF THE GRAND FOUNTAIN.

taining laurel continue the lines of the steps below, while the higher level is bounded by a balustrade. The second terrace consists of groves of ilex; in the centre between them is greensward with a long, low, plain stone trough or hollowed table extending along the main axis, containing a shallow body of water, apparently quiet, yet ever changing and playing its own part in continuing the supply to the grounds below. At the end of this terrace, abutting the wall of

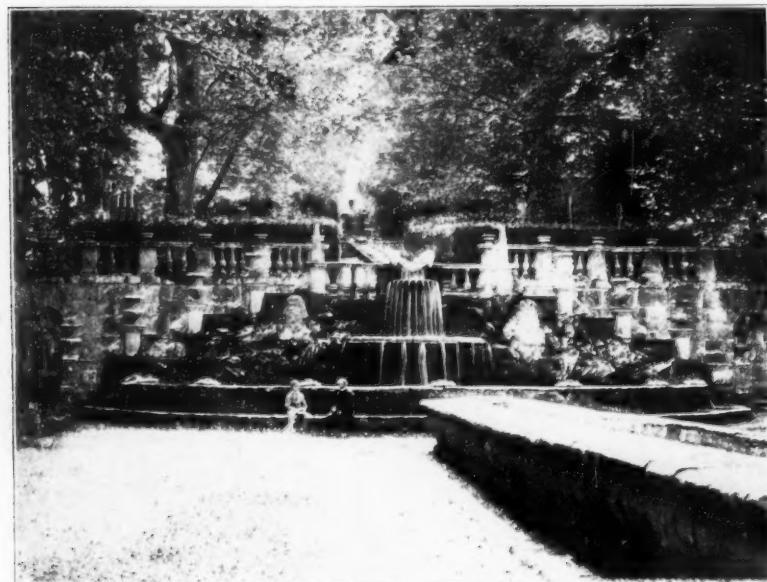


FOUNTAIN AT THE UPPER END OF THE FIRST TERRACE.

the next level, is a semi-circular fountain of three concentric basins, two figures of reclining river gods marring an otherwise pleasant spot.

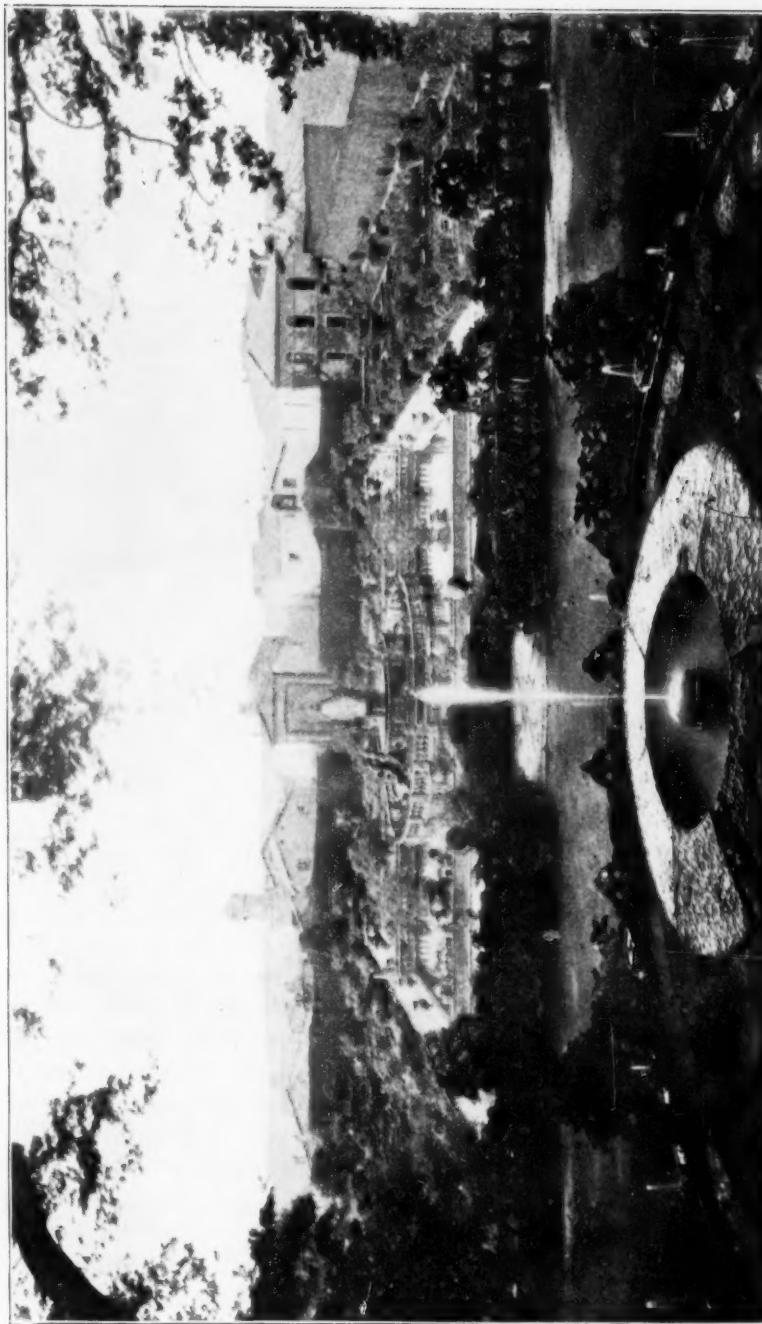
The third terrace is gained as the others, by flights of steps on both sides of the fountain. A low wall with stone vases serves for a balustrade and the retaining wall of the higher level is continued with a series of niches to the limits of the garden. This, perhaps the most charming terrace, is narrowed to about one-third the width of those below, but is longer. Down its length, at the slightest incline, runs for ninety feet a narrow stone trough of wavy form and curved outline, so that the water, meeting in its downward course a hundred little impediments, ripples continuously, and its sweet, low music, borne on air heavy laden with the scent of orange blossoms, must be very soothing as it reaches the open loggie below on those days when the sun of central Italy seems never to lose its fierce, burning power.

Stone seats and high hedges run parallel with this water-course to the farther end, where the fourth and highest terrace is reached, still narrow like the preceding one, and separated from the surrounding park-land by a low wall, on which is a colonnade with stone vases set in the intervals, all now covered with ivy, and here and there an old fig tree trained flat and reaching from column to column. In the centre is an octagonal fountain with dolphins; sur-



THE SECOND TERRACE.

rounding it are stone seats, and beyond is greensward. At the upper end, between two small buildings, forming merely open loggie, is the rocky niche from which flows the source of all the fountains. Gnarled fig and ancient ilex have grown so close and so tenderly shield this spot that their branches mingle with the dense growth of ivy and ferns, and as the water falls on these the stream loses its force and turns each point of every leaf into tiny jets, so that the great architectural gardens below are fed after all but from a misty shower. Aside from the wonder and admiration with which one views each successive part one is awed at the knowledge which accepted so small a source and at the skill with which it was utilized, which directed it step by step from source to fountain, from fountain to pool and from level to level, all so perfectly adjusted that each has played its part for centuries. Above all, there is no great display, no wearying dash or roar. The subordinization of all parts of all colors, and even of all sounds is here perfected to attain a simple unity. Protecting these gardens and forming a worthy setting



LOWER GARDEN AND TOWER, FROM THE FIRST TERRACE.



THE THIRD TERRACE.

for them are great groves of ilex and olive orchards and vineyards, stretching away to the rugged hills where the Roman pine and the cypress show clear against the white walls of some monastery, which here, even as in Tuscany, seem part of every eminence. On one side only is seen the little village, its grey stone, grey-tiled, weather-worn, sun-bleached houses grouped close to form one street and one piazza, where rise towers greyer and older, more bleached and even more picturesque than the houses; where the women meet every morning with their great water jugs to draw their daily supply from the old octagonal well, and where all winter the people sit on the sunny side and talk of the two events which most affect their lives, the vintage and the coming of the Duke.

Edward S. Cat.

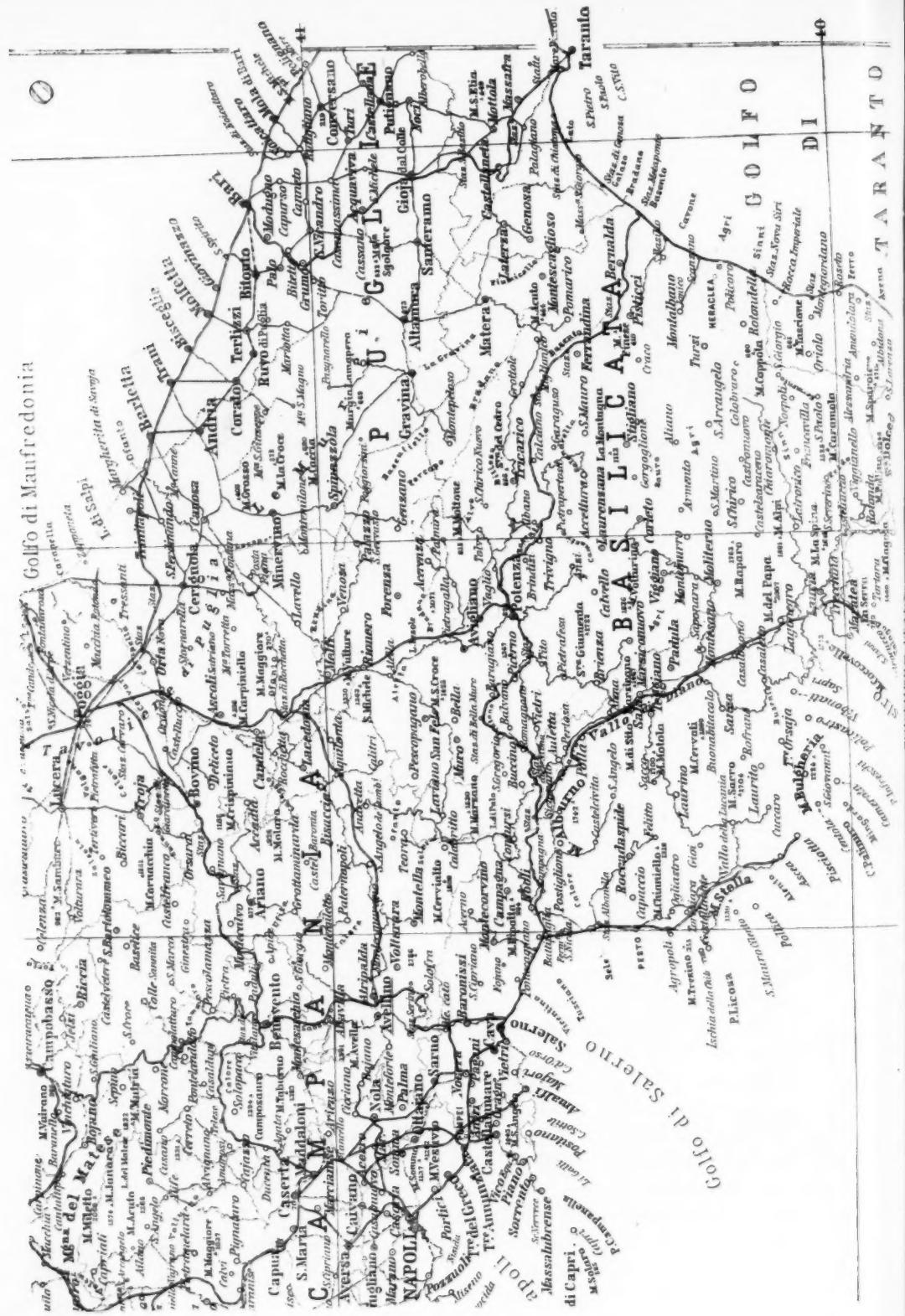


THE OLD CATHEDRAL, MOLFETTA.

J "UNKNOWN ITALY."

In the spring of 1895, Gen. C. G. Loring, Director of the Boston Museum of Fine Arts, was good enough to call my attention to some photographs of Italian architecture from the unfrequented territory of Apulia which he had recently purchased for his museum. Not only were the subjects of these pictures wholly unfamiliar, but even the names of the towns in which they had been taken were for the most part also unknown to me. It was General Loring's idea that these localities might offer something of interest in the direction of the studies which he knew I was about to undertake in Italy, and the result of this kindly interest on his part was a visit to the territory which I am bold enough to denominate "Unknown Italy." The midsummer season, the later part of June and early part of July, was chosen by necessity for this trip, and it may be mentioned for the benefit of others that the heat was by no means intolerable at this time. Here, as in other parts of Italy, the dryness of the air enables one to endure the heat without great difficulty. A sun umbrella is indispensable, but with this protection one can go about even at noon time without serious discomfort.

It is quite likely that the names of the cathedrals of Altamura, Matera and Bitonto are as unfamiliar to the readers of the "Architectural Record" as they have been to me—and quite probable that most of them are personally unfamiliar with Bari, Troja, Barletta and Trani. As for Ruvo, Andria, Molfetta, Acquaviva delle Fonti





S. MARIA DELLE GRAZIE. GRAVINA.

and Bitetto, it is safe to assert that even Italians outside of these places, to say nothing of other nations, know very little about them.

The simple fact is that Italy is such a mine of interest to the archæologist and the art-historian that they may, and do, spend years of residence and of study in the country without exhausting its riches, while the inconveniences and discomforts of these out-of-the-way Italian towns of Apulia have so far discouraged even the advance guard of adventurous tourists from "doing" this part of the country.

The churches and cathedrals have, however, notwithstanding their isolation, not escaped the omniscience and omnipresence of German research. The monumental publication of Schulz* in five volumes of text and one large folio of plates is a splendid work.* It has, however, shortcomings in the matter of comprehensive illustration, whose special causes have been explained in the preface of the work itself. The publication of Huillard-Bréholles must be judged as a literary history of the Normans and Hohenstaufens in South Italy.† In this sense it is a worthy and competent book, but its illustrative plates represent a mere fraction of the actual monuments, even as compared with the folio of Schulz. Schulz is the only archæologist who has thoroughly examined the country, but his actual sojourns and explorations in it date back of 1842, while the book known under his name was given to the world in 1860, five years after his death. When it is understood that much of the text was compiled after his death, in 1855, by collaborators who had not visited the territory, and that all the illustrative material was collected before 1842, it becomes clear how some gaps can be pointed out in this excellent and indispensable monument of German erudition.

Before saying a word or two about the splendid architectural monuments of this territory we will record some facts of travel experience bearing on its isolation and backwardness, which are only paralleled in the most obscure villages of Egypt, of Syria, or of Asia Minor.

The rarity of photographs from Apulia is, in the first place, significant of this isolation. Naples is the natural centre for photographs from South Italy in general, but none are obtainable at Naples for any site east or southeast of Beneventum. In Rome only one series is accessible. This is the set made under the auspices of the Italian Ministry of Public Instruction by Signor Moscioni and for sale at his shop in the Via Condotti. This set was made about five

*Denkmäler der Kunst des Mittelalters in Unter Italien. Dresden, 1860.

†Recherches sur les Monuments et l'Histoire des Normands et de la Maison de Souabe dans l'Italié Méridionale. Publiées par les soins de M. le Duc de Luynes. Texte par A. Huillard-Bréholles, Traducteur de Matthieu Paris. Dessins, par Victor Baltard. Paris, 1844.

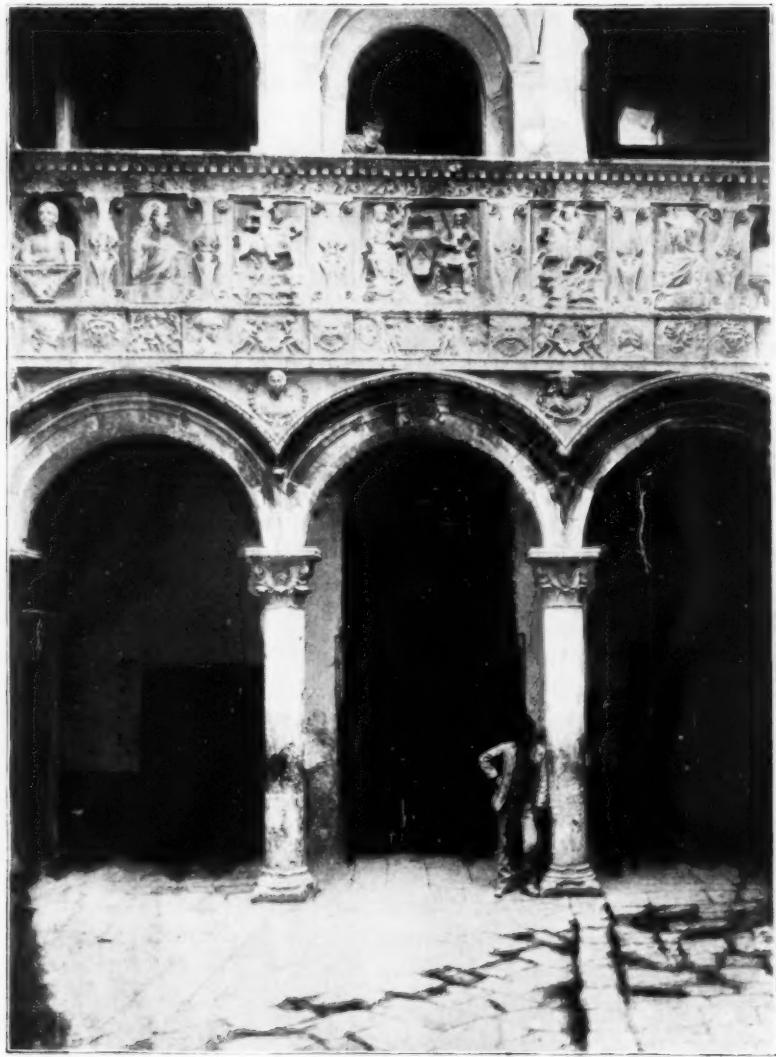
years ago, and before this date there were apparently absolutely no photographs obtainable from this district. That they are not to be had in the towns themselves will appear from what follows. Even at Bari, the most thriving town of Apulia, with a population of 60,000 inhabitants, I saw absolutely no photographs. Photographic plates were likewise unobtainable. They can be had nowhere in South Italy outside of Naples, and this warning may be of service to others.

Some notes as to hotel accommodations and other questions of creature comfort will suggest why there are no tourists in Apulia, and this again will explain why photographs are confined to the series made by Moscioni under Government auspices.

On the railway line which carries one across Italy from Naples in a general eastward direction, Beneventum is the most important town. It is in a sense a very well-known place, though not often taken in by tourists. One obtains here a first hint of what is to follow in the way of hotel accommodation from the fact that one of the two leading hotels has a hen roost directly inside the main entrance. The said main entrance gives the hens access to the outer world. I was drawn to this hotel by Baedeker's praise of its cleanliness, and his praise, be it added, is quite justified, after one has compared the entrance with the interior. The reason that the hotel is so clean is that the hen roost is close to the front door; otherwise it would be insufferable. In fact, if one is to keep hens in town and give them the run of the street this arrangement seems most commendable.

The junction of the Naples line with the railway which runs down on the eastern side of Italy from Ancona to Brindisi, is at Foggia. It will illustrate the amount of through express travel by way of Foggia to say that its railway restaurant has several waiters who speak English. This was not noticed by me in any other railway restaurant of Italy and is due of course to the through express travel down the eastern coast to Brindisi, as one main point of departure of English travel to India, Egypt, Greece, Syria and Constantinople. The railway line from Foggia to Brindisi carries most of the through express travel from Northern Europe to the southern and eastern Mediterranean, but of the thousands who use this line, perhaps not one has any conception of the interest of the neighboring architectural monuments.

Only twelve miles distant from Foggia lies the Cathedral of Troja, whose architectural details offer the most remarkable mediæval survivals of classic art to be seen in all Europe. Neither Venice nor Pisa can offer anything as marvellous in the way of classic survival as the capitals of Troja. The decorative details of its bronze doors are the finest mediæval metal work in Italy or in all Europe, judged from the standpoint of decorative art; although



PALAZZO SIROS, BITONTO.



CATHEDRAL, ALTAMURA.

in figure design they are surpassed by the bronze doors of Trani and Ravello. Its rose window has no parallel in the art of Italy.

Should any one be surprised that these facts hold of a place of so little renown, it will offer a partial explanation to describe the leading hotel. If you go to Troja, as we did, by carriage from Foggia, your carriage and horses will be stabled in the hotel dining room, and your dinner will be cooked in the same apartment, which is thus, at one and the same time, a most excellent stable, an indifferent kitchen, and an indescribable *salle-à-manger*.

One English-speaking Italian, was, however, found at Troja, a reminder that the territory to be described furnishes the bulk of the Italian emigrants to America. There is said to be in the South Italian province, known as the Basilicata, a town in which three-fourths of the men speak English. These men are, or have been, organ-grinders, and it is said that this town furnishes a large proportion of the organ-grinders of the English-speaking world. In our own experience, however, no English was spoken in this district, outside of Troja (and the Foggia railway restaurant). The population of Apulia is quite guiltless of French.

But Troja is a small place, and its undeniable isolation would account for almost anything, except the forgotten glories of its marvellous cathedral. It is in the larger towns of Apulia that one finds the most peculiar phases of undeveloped culture and primitive society. Take, for instance, Andria, which is only seven-and-a-half miles from Barletta (Barletta is on the main line below Foggia). Andria is credited by a Baedeker of 1890 with a population of 37,000. The population, at the time of my visit, was said to be over 40,000. Under these circumstances it will be considered incredible that there is not one restaurant of even the humblest description in this place. It has no shop with a glass window in its whole compass. In fact nothing was seen that could be called shop by the extremest stretch of courtesy. Having found a hotel over a stable it turned out that its one sleeping apartment was not available for guests who were in search of solitude at night. After diligent search and inquiry for a place where one might obtain supper (naturally not excluding the hotel simply because one could not sleep there) it was manifest as well from information as from a prolonged search through the principal streets that not even one *trattoria* was to be found in Andria. Refuge was taken in a humble private dwelling, which afforded a warm-hearted welcome and primitive accommodations. The good people of this house were somewhat prejudiced against Americans. They had several friends who had relations in America. These friends had written to the American police for information about their relations, and the police of America had sent no manner of reply, all of which was considered most

heartless and indifferent, and a distinct stain on the national character.

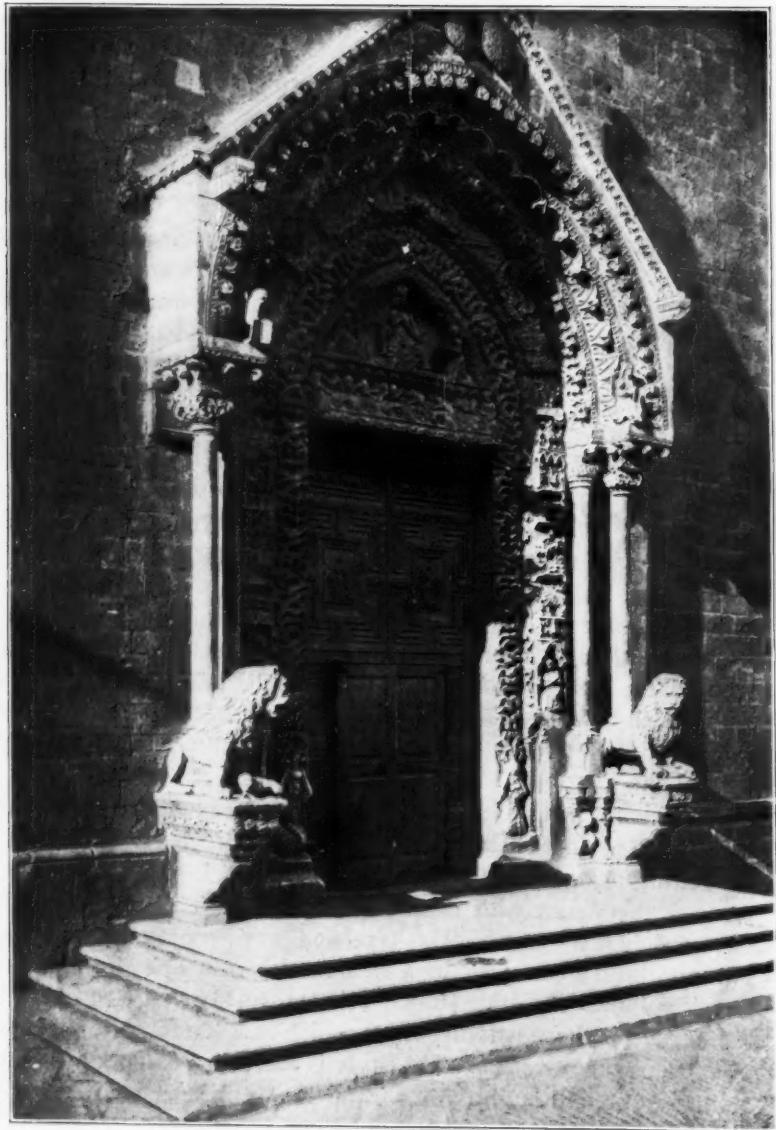
The conditions at Andria are surprising, considering that it is on a steam tramway running between Barletta and Bari and that it is accessible four times a day from both places, but these conditions are typical for the best part of Apulia. Barletta itself, it is true, has not much to boast of in the way of comforts for the tourist, but Bari is a thriving place, by no means destitute of creature comforts, among which a multitude of barber shops which are actually decorated with mirrors, affect one with an indescribable atmosphere of reckless extravagance and dissipation, after a vain search for a glass of vermouth and seltzer at some neighboring place like Bitetto, with a population of 26,000.

To continue this catalogue of hotel and restaurant grievances we may quote an experience at Acquaviva delle Fonti, which is on the main line from Bari to Otranto. Here the most expensive supper obtainable cost the sum of seven cents. The host of the *trattoria* offered me the bread which was left on the table, after the repast was finished. Having paid for it, it was mine, and the expectation was consequently that I should take it away with me. No coffee was obtainable at this *trattoria*, but we were referred to a *café*, so designated by a sign in the neighboring public square. It was somewhat of a disappointment to find that this *café*, which was the only one in town, had no coffee to offer at half-past-seven in the evening, although a military band was playing in the public square. The relative nearness of Apulia to the Oriental world, and the ease with which coffee can be obtained in out-of-the-way Oriental towns, makes this experience very significant for the poverty and stagnation of the district.

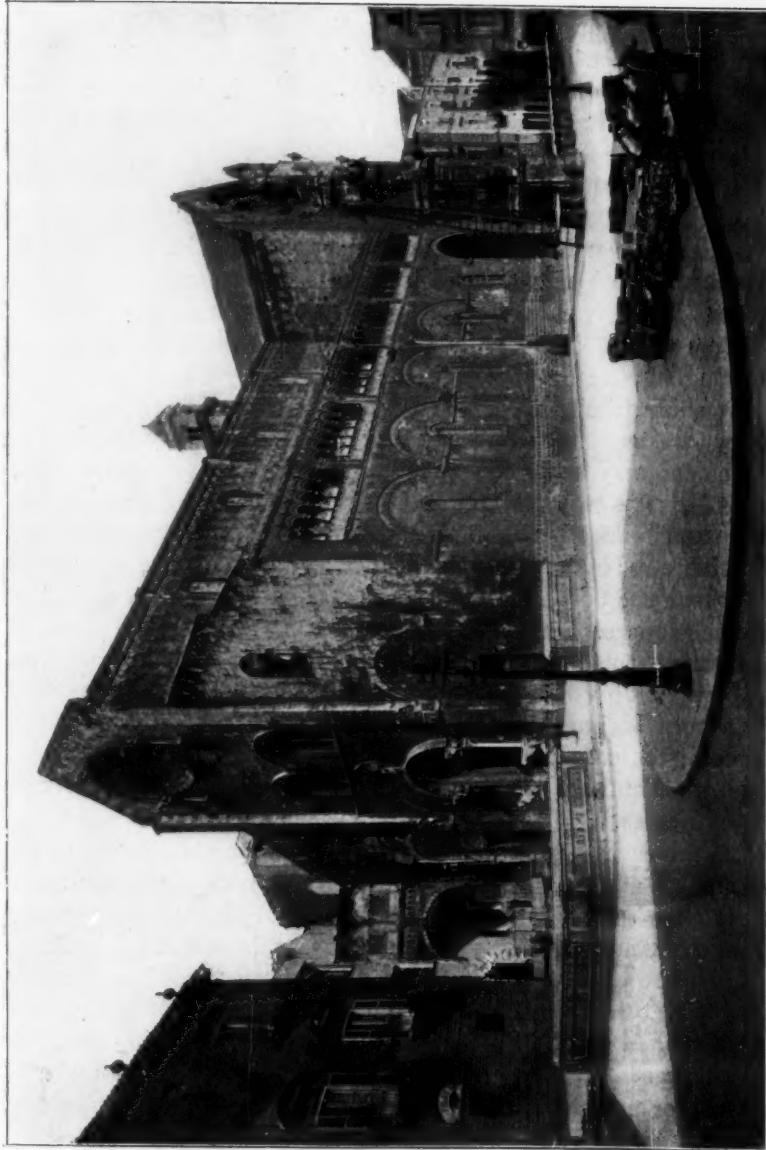
An incident met with at Bitetto will farther illustrate the primitive conditions of this society. Our host in the *trattoria* of Bitetto, after setting a jug of water on the table, raised it to his own lips and partook therefrom with absolute simplicity. The jug from which he drank had the old Greek shape and was decorated with a Greek pattern; both descended in a straight historic line from the old Greek colonies of South Italy. The cathedral at Bitetto has a very fine façade and a phenomenal ground plan. The interior is spoiled by Renaissance overlay. The style is in reality essentially Apulian Romanesque, although dating from the Gothic period.

The character of the accommodations awaiting the student of the marvellous cathedral at Altamura and of the very fine cathedral at Matera may be argued from the above incidents.

What has been said on the subject of accommodations is mainly to explain why we have chosen "Unknown Italy" as the title of this Paper. The recorder of these incidents found himself personally



MAIN PORTAL, ALTAMURA CATHEDRAL.



CATHEDRAL, BITONTO.

absolutely happy in this country. There were no real discomforts and no real privations. The people were genial and polite. The architectural monuments were splendid. The weather was perfect, and the air was pure. The scenery was varied and interesting. The wine was not bad. At Matera it is said to be exquisite. This information was offered by my esteemed friend, the photographer Moscioni, long after Matera had been sampled for cathedrals rather than for wine.

One thing results from the conditions we have described. In view of the inexhaustible wealth of Italy in art treasures which are more accessible, and in view of the absence of such hotel accommodations as the average traveler is accustomed to expect, it is certain that many years will elapse before the monuments of Southeast Italy will be familiar, by personal observation, even to the archaeologist.

How such primitive conditions come to exist in any part of a country presumably as well developed as modern Italy the following incident may serve to explain: An English gentleman who was met in a railway carriage between Orvieto and Rome told me of his acquaintance with a high Italian official, who had been born at Altamura. This official related that as a boy he had been used to dance on the bodies of the brigands when they were exposed in the public square. This was one of the amusements of the youth at Altamura as recently as 1870. The railway through Altamura has only been running five years. The tramway to Bitonto, Ruvo and Andria from Bari has only been built about the same length of time. At present the country is absolutely safe, but it is not many years since brigandage has been put down in the territory of the former State of Naples.

As to the character of the population there seems to be no upper class and no middle class outside of Bari. There is not even any distinct class of small trades-people. The country peasantry and farming population live only in the towns, and these are now destitute of any other class of inhabitants. The large landed proprietors appear to be residents of Naples. The only educated people are the ecclesiastics. As to how these people manage to live without shops and restaurants, it would appear that they are very poor and extremely economical, and that their simple wants are supplied by occasional fairs. The towns impress one as wholly populated by the class one meets in the Italian laborers of American cities, which class is by no means typical for other parts of Italy, as all tourists are able to testify. It is, of course, the present poverty of this territory which causes this emigration from it to be so heavy.

That Apulia has had another history and a different past, that its present condition is a retrogression, is sufficiently evident from



PART OF THE FACADE, RUVO CATHEDRAL.

the architectural monuments. The population described is uniformly distributed through all classes of dwellings in towns which frequently boast very fine Renaissance palaces, now utterly abandoned by the class which built them. There is hardly a single town which has not a cathedral of an importance far beyond its present condition. There are fine Renaissance palaces and fine cathedrals in places where one cannot buy a glass of vermouth or a sheet of writing paper, and where a three-cent cigar is a luxury beyond the means or, at least, beyond the aspirations, of every inhabitant.

To judge, however, from the comparative number of surviving buildings, even the Renaissance period was one of relative decay as compared with Northern and Central Italy, and the great time of Southeast Italy evidently ended mainly with the Hohenstaufens and the middle of the thirteenth century. The most flourishing period of this territory since the Greek colonies of early antiquity must have been during the Byzantine rule which closed, generally speaking, during the eleventh century. Under the Normans and under the Hohenstaufens, it continued to enjoy a high degree of prosperity and importance, and most of the surviving churches are of the twelfth and thirteenth centuries. The Saracens sacked and ravaged Apulia, and first impaired its prosperity. The Normans who drove them out and who at first figured as the military force of the Byzantine State, whose rule they soon overthrew, were not able or fit to improve the Byzantine civilization, which scarcely survived the Hohenstaufen successors of the Normans. The country must have been at low ebb during the time of the Anjous (after 1272), to judge from the relative absence of Gothic monuments. The Renaissance does not appear to have done much for its sunken fortunes outside of the coast towns, to which the Renaissance palaces are mainly confined. Gravina, however, which lies east of Altamura, has many fine monuments of the Renaissance period.

Among the cathedrals of the first class, that of Troja must be given an altogether pre-eminent mention. In certain features it outranks any building of the Byzantine-Romanesque architecture of Italy. All things considered, it cannot be ranked below any Byzantine-Romanesque building in Italy, excepting St. Mark's at Venice and the Pisa Cathedral. On account of the importance of the details of Troja we shall reserve them for a separate and following Paper.

The Cathedral of Altamura deserves the next mention in order, for dimensions and decoration, and as offering a unique example of a German Romanesque type of building in Italy, as regards the relation of spires and façade. Begun and mainly finished by the Hohenstaufen emperor, Frederick II., who also founded the town in 1220, it shows the arrangement of the double spires rising from the

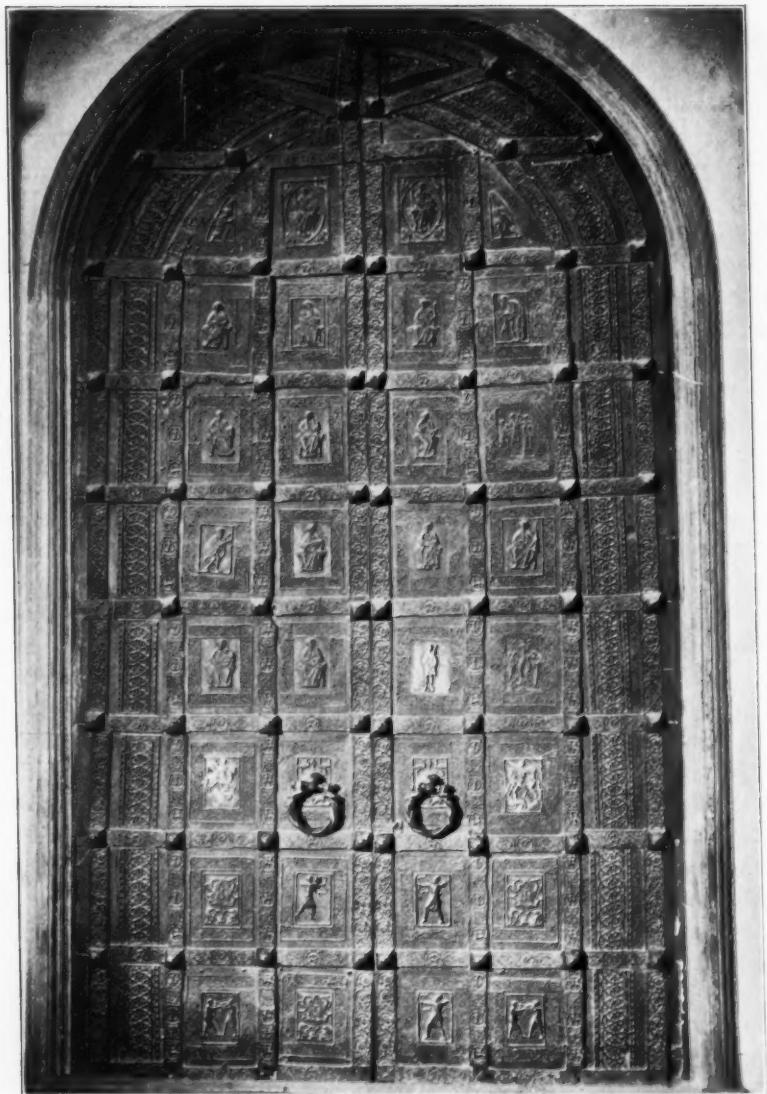
façade and forming a portion of it, which is otherwise absolutely foreign to Italy. In general effect, Altamura suggests a Rhine Cathedral, although its details show the characteristics of the Romanesque of South Italy.

The main portal, considered simply as a doorway, is the most richly and sumptuously decorated bit of the kind in all Italy. This portal dates from the Anjous, and shows Italian Gothic quality in some points, although generally following the style of work peculiar to the Romanesque of Apulia. These hooded portals, with columns, resting on lions, or griffins, are more numerously represented by fine examples in Apulia than in any other part of Italy or of Europe. Several of our illustrations show these portals. They survive in many churches whose interiors, as at Bitetto, have been wholly spoiled by restorations and Renaissance stucco. They have also created a similar type of window which have no counterparts in other parts of Italy or of Europe. (Page 143.)

A most peculiar indication of the conservatism of Apulia and of its backward conditions during the Renaissance is the survival of these mediaeval portals resting on lions, through the Gothic and down to the late Renaissance period. This curious mixture of mediaeval and Renaissance art is found, for instance, at Acquaviva delle Fonti. It was some time before I could persuade myself that the Renaissance architect had not placed a new portal and columns on older mediaeval lions, a suggestion which may occur to some students of the photographs, but which is positively not the case. Similar instances of Renaissance survival of these portals occur at Bari, at Conversano and at Gravina.

To recur to the Altamura Cathedral it may be added that its interior has suffered from a modern marbleized stuccoing, but that the mediæval details and carvings are all intact and free from disguise. Notwithstanding its dimensions, its interesting peculiarities and its splendid portal, Altamura Cathedral is not mentioned by Burckhardt's Cicerone, the best general guide to the art of Italy. It is erroneously mentioned by Baedeker as a "Norman" Cathedral. Baedeker passes it by with the slighting remark that there is "a Norman Cathedral on the road from Potenza to Grumo." Murray mentions the "fine cathedral," but Fergusson only specifies the name of the place.

Neither the town nor the Cathedral of Altamura are mentioned by Huillard-Bréholles, one of the two supposedly special authorities on South Italy. The plate illustrations of Schulz are confined to a section, a plan, and a few details; but the portal has fitting mention in his text to the effect that "there is probably in this district hardly another which could be compared with it for beauty and perfection." The accounts which are given by Schulz of his travels in Italy



BRONZE DOORS, TRANI CATHEDRAL.



DETAILS OF BRONZE DOORS, TRANI CATHEDRAL.

would indicate a very slight acquaintance with North and Central Italy, and we may boldly extend his verdict to the whole country, provided the qualification be made that one is speaking of a portal as distinct from a façade.

Bitonto Cathedral receives full justice from Fergusson, who rightly pronounces its upper exterior gallery the finest thing of the kind in Italy. (Page 135.) Bitonto is easily and quickly reached from



SOUTHERN GALLERY, BITONTO CATHEDRAL.

Bari. It shares with the more inaccessible Matera; best reached by carriage from Altamura; the distinction of having a fairly intact ancient interior. The capitals of Matera are among the most vigorous and beautiful of all mediæval Europe, but are not especially Byzantine in quality. They are probably local Italian work under Norman direction. The fine character of the exterior is to some extent shown by our illustration. This church is "Norman," according to better authorities than Baedeker. Matera is not mentioned by Burckhardt. It is not even indexed by Baedeker. Fergusson, however, gives an excellent illustration. Matera Cathedral has no illustration whatever, either in Schulz or in Huillard-Bréholles. The mention in Schulz dates from the collaboration done after his death, and is very meagre and insufficient. Bitonto Cathedral is not mentioned by Huillard-Bréholles, and the single plate of Schulz is a poor affair. The description and text of the latter are, however, quite competent in this case. There are no records to give the date at Bitonto, which is fixed, on general grounds, for the thirteenth century.



WINDOW IN APSE, BARI CATHEDRAL.

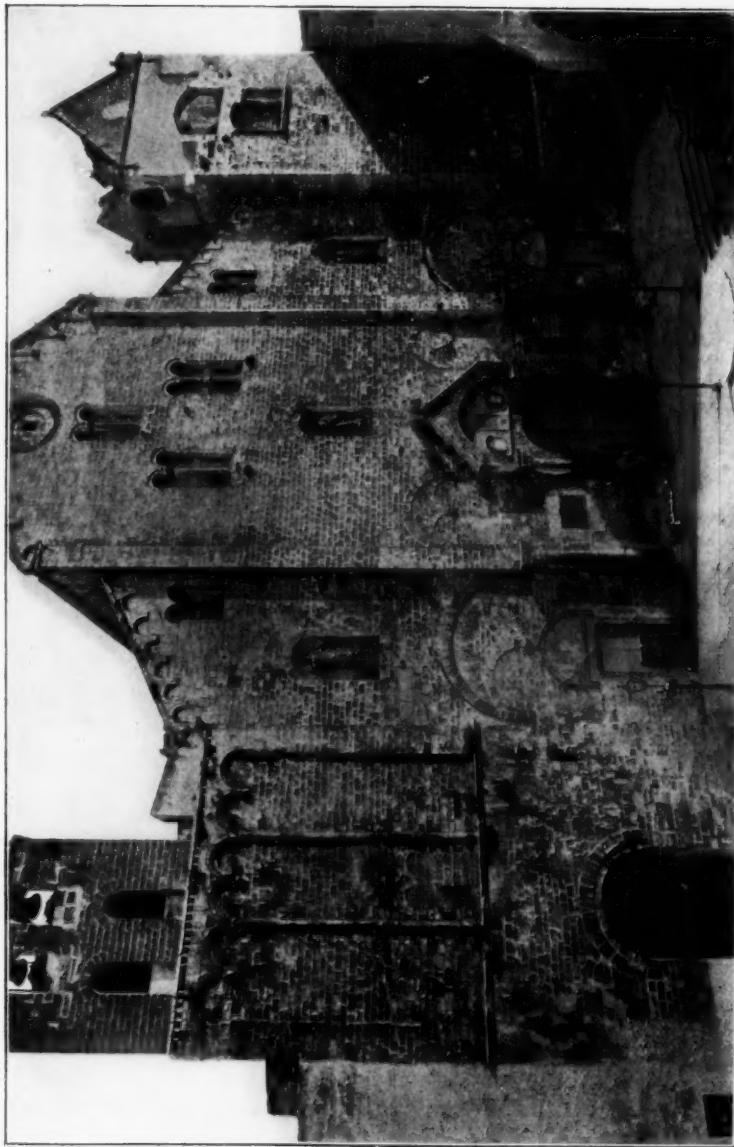
Ruvo Cathedral, in the close vicinity of Bari, is another interesting case of intact Romanesque preservation, both within and without. In 1833 Schulz was "astonished to find here a most stately Cathedral." This experience of astonishment was repeated by me in 1895, as I had then no knowledge either of Schulz or of Moscioni's pictures. It will give an idea of the difficulty of research in Apulia to say that even the existence of this church is unknown to the guide books. Moreover information on such matters is unob-



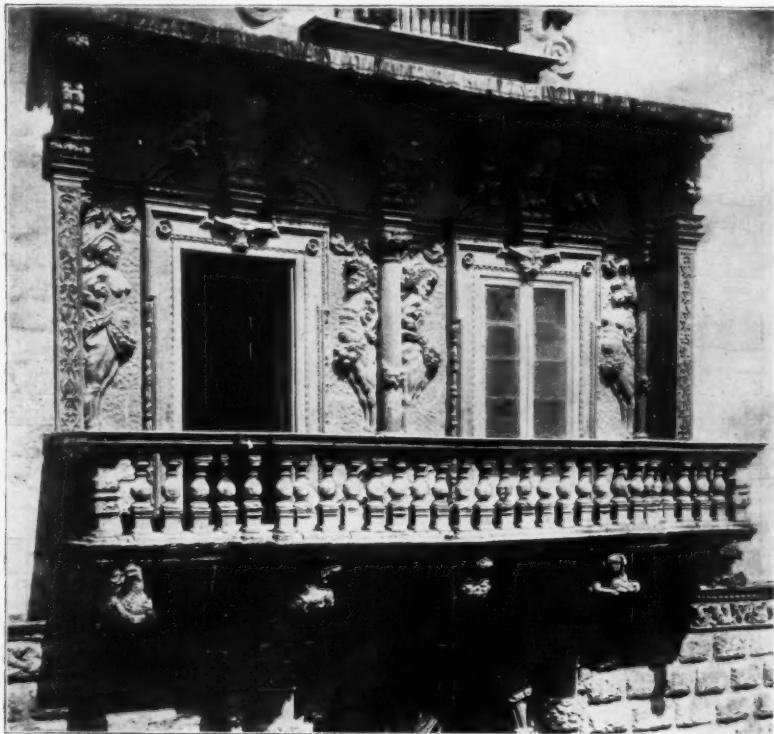
CAPITAL IN THE RUVO CATHEDRAL.

tainable from the inhabitants, even in well-to-do places like Bari, because they have no comprehension of one's distaste for Renaissance stucco and made-over interiors or of their uselessness for purposes of study. This cannot be explained to them because they have no conception of the periods of architecture, of the peculiarities of Byzantine-Romanesque style, etc. Therefore one cannot tell

BASILICA OF S. NICOLA, BARI.



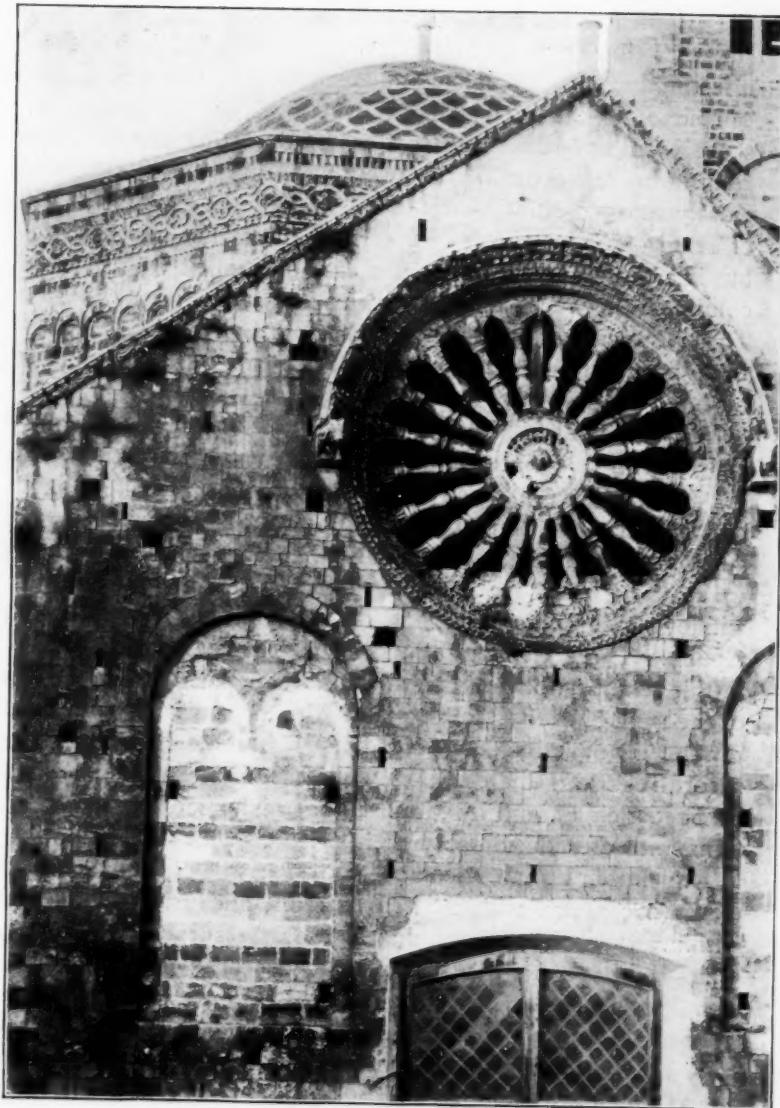
in advance whether one is being sent fifty miles to see a small architectural fragment like a doorway, or an intact Romanesque interior, or a wholly spoiled and Renaissance church. Italy, of course, is full of restored interiors, but elsewhere the books give one warning what to avoid. Thus it chanced on my trip from Bari to Barletta, by way of Bitonto and Andria (and return to Bari by Trani and Molfetta), that I passed through Ruvo without having any idea that there was an old cathedral there. This advice was first given by a priest on the train from Bari to Altamura, which is on a different road. The capitals of Ruvo are exceptionally fine, and the



BALCONY OF THE PALAZZO FRAGIANNI, BARLETTA.

façade is highly interesting. Huillard-Bréholles does not mention this church.

Andria, which was once an important seat of the Teutonic Knights, and of the Hohenstaufens has now nothing to offer but fine bits, like church doors and the like, but Castel del Monte, a castle of Frederick II., ten miles away, is the finest mediæval castle of all Italy, a country in which feudal castles, as distinct from castellated town halls and town palaces, are otherwise almost unknown.



DETAIL OF BARI CATHEDRAL.

Castel del Monte has been well published, both by Schulz and by Huillard-Bréholles, Isabella Plantagenet, daughter of King John and spouse of Frederick II., is buried in Andria Cathedral crypt, but the tomb has been destroyed.

Barletta has not much to boast of besides the colossal bronze statue of the Emperor Heraclius. The cathedral is a rather uninteresting building, completed under influence of French Gothic, due, of course, to the Anjou rule over Naples.

At Trani the cathedral has a most interesting exterior, with Byzantine bronze doors of the twelfth century, which resemble very closely those at Ravello, and were done by the same artist, a native of Trani. The interior is defaced by Renaissance marbleized stucco, but is a rare and perhaps unique case of a mediæval use of coupled columns in a church interior, dating from the original construction. The doubling of the columns at Bari, in San Nicola, was an after-thought, due to an earthquake, and not part of the original design, but may possibly have suggested these at Trani.

The Cathedral of Molfetta is a well preserved Romanesque dome church with some interesting detail of partially Saracenic quality.

Bari, which we have already eulogized, appears like a small edition of Paris to a tourist who has been knocking about in Apulia, and who likes meat for dinner and other similar luxuries. Its cathedral has been modernized, but boasts a splendid hooded window, with columns resting on elephants, of a type peculiar to Apulia. These elephant supports, which are frequently met with in this territory, have no parallels in other parts of Europe, outside of the symbol of the Malestesta at Rimini, and must point to a Byzantine introduction from North Africa. One is reminded of the record regarding the elephants and other African animals imported by Frederick II. and by Manfred, but many sculptured representations antedate considerably their period.

The church of San Nicola, at Bari, is a fine old monument of the eleventh century, with a stern exterior, and is essentially intact within. It furnished good material for the surveys which were the main object of our trip, and which have been published in earlier Numbers of the "Architectural Record."

The two hundred photographs of Moscioni, subsequently found in Rome, taught me that I had missed many of the splendid monuments which are scattered through Apulia. The best and only real guide to this territory is to be found in these pictures. From them, for instance, I first learned of the importance of Gravina, only seven miles east of Altamura, with its fine early Renaissance Cathedral and many other interesting Renaissance monuments. Gravina has apparently escaped the researches of Schulz, and has certainly escaped the mention of other authorities. But the most curious case

of an absolute and universal oversight, first corrected by Moscioni's pictures is that of Conversano. Conversano is only ten miles from Bari. On the authority of Moscioni's photographs the cathedral can be quoted as a rare case of intact Romanesque preservation both without and within. The interior shows the only case in Apulia of the use of interior masonry in the variegated style of the Pisa Cathedral, and is altogether a well-preserved and remarkable monument. Although Schulz had repeatedly and persistently studied closely adjacent churches his work contains only a hearsay mention for Conversano of four or five lines, dating from the collaboration after his decease. Conversano undoubtedly ranks in importance among the first four or five cathedrals of Apulia, and yet it is not even indexed by Baedeker, Murray, Burckhardt, Kugler, or Fergusson.

The following additional places, which are represented by important photographs of Moscioni's set have not been mentioned in this Paper: Gioja del Colle, Canosa, Noicattaro, Bisceglie, Corato, Colonna, Rutigliano, Noci, Castellana, Polignano a Mare, Mola di Bari, Monopoli, Terlizzi, Giovinazzo. Of all these places Canosa is the only site previously known to illustrative publication. It was a mere chance which saved me from missing Troja, which was discovered, so to speak, on the way back to Naples. The details of this cathedral are too important to be minimized by the limitations of illustration incumbent on a single article, and they will find their place in the following number of the "Architectural Record."

Wm. H. Goodyear.



MATERA CATHEDRAL.

STUDIES IN ANTIQUE FURNITURE.

English Chairs.

FROM the time of the early savage hut down to the present day, man has impressed upon his dwellings, not of the spirit of the time in which he lived, but direct evidences of his own personal character. Actual personality is, perhaps, more observable in furniture than in houses, and it is in the immediate surroundings of the individual that we find the strongest reflection of his tastes and habits. The reverse of this is equally applicable, for not only do we influence articles in daily use, but they exercise considerable influence over us. The mere association with beauty tends towards refinement; and what is artistic beauty in furniture but true proportion joined to excellence of construction and faithful, intelligent workmanship? The basis of all artistic conception is real love of the work and sympathy with the subject operated upon, and if the evidence of this is continually before us in our daily life we must instinctively shape our thoughts and lives to the same standard. It may seem a small matter to consider why the old method of "riven" oak panelling was adopted in preference to sawing it into planks as at present, but the mere fact that the tree could not be "riven" when the branches began to appear because of the knots, leads us to an appreciation of the honesty and thoroughness of past labour, while an examination of the way in which each portion of an old oak chair was tenoned and pegged into the other till the whole was rendered practically indestructible is apt to raise doubts of the mechanical workmanship of the present day even in the most unthinking mind. Wonder is often expressed at the way in which Chippendale and Sheraton furniture, with all its seeming delicacy, has lasted intact for over a hundred years, but when it is remembered that Chippendale never carved a fret without glueing together three thicknesses of wood, so that each different way of the grain should protect the other, and that Sheraton devoted whole pages of his book to constructive directions for even the most simple table, it is no longer surprising that the work of these men should have stood the test of time in the wonderful way it has.

Such reflections excuse the serious study of furniture, and if the examination of old specimens leads the public to wish to be again more in touch with the designer than the manufacturer, there may be some hope of the re-union of art and the furniture industry. The architectural designers of old led the public taste, they did not fol-

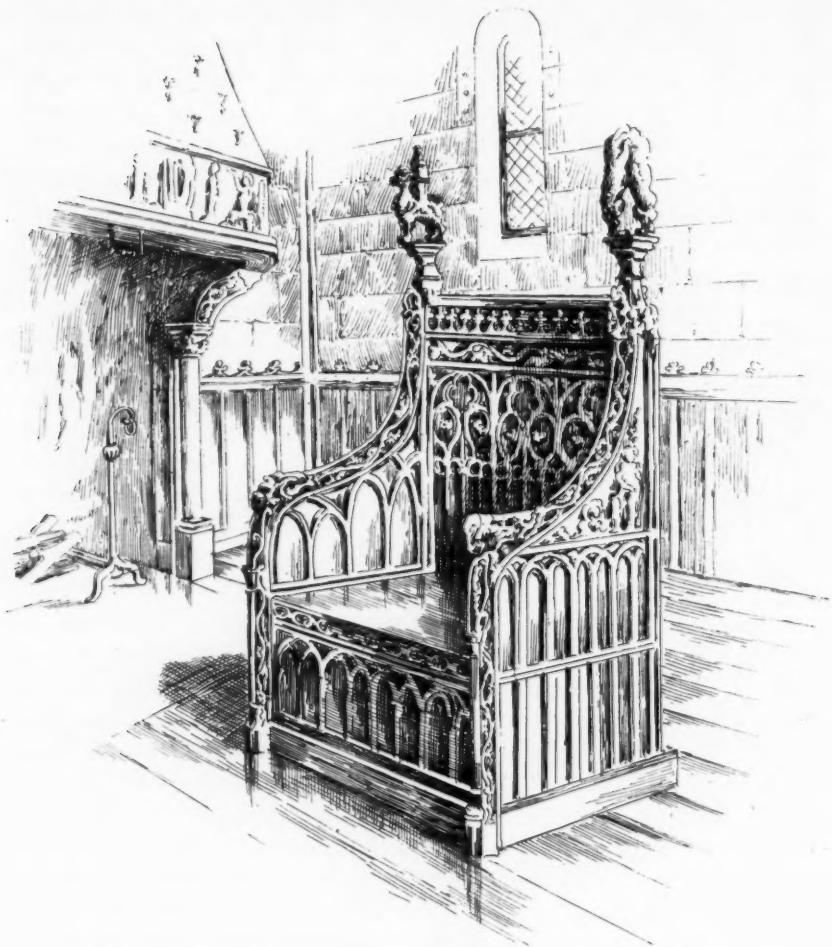
low it; and when designers no longer express their individuality, but simply supply the demand for any well-known style, they pander to the public taste, without attempting to turn it in the right direction. Though some architects are following out an original aim and giving cabinet-making an impetus by introducing better principles of construction, yet what characteristic style is in vogue at the present time as distinctly individual as those we associate with the eighteenth century designers, who were the outcome of the association of architectural and furniture design?

To trace the evolution of the English chair from early times is to follow almost exactly the life of the race. From the time when houses were first built, a seat of some sort was required in the room, though such necessaries must naturally have been rude and simple till civilization transformed them into objects of luxury. As the only representations we possess are of finished specimens, it is impossible to form a chronological series, for the earliest seats were probably constructed of rude blocks or single planks joined together with little knowledge or skill, in an era too illiterate to leave much artistic legacy.

Our knowledge of the earlier forms of English furniture is mainly derived from ancient drawings, carvings, illustrations, and painted glass, but Anglo-Saxon seats are about the first of which we have actual representation. Some of these were made to fold up, like garden chairs, while the supports were carved in imitation of the heads and feet of animals. There are engravings of stools in the shape of an X in manuscripts of the seventh century. While in Strutt's "Dresses and Habits" and "Manners and Customs" cross, solid and pyramidal seats are illustrated, some with square backs and others with triangular seats, all belonging to the eighth century. Judging from these drawings the seats must have been provided with loose cushions, while a canopy was often fastened above the raised platform as a protection from the weather.

The influence of Norman civilization had its effect, for in the reign of Henry III. panelling began to be used, and the seats became completely enclosed, with the woodwork perforated to the circular-headed arches. But the taste for Gothic in the succeeding era changed the seats into high pedimented thrones, whose carving closely followed the prevailing architecture. There are still several specimens extant, such as the Coronation Chair in Westminster Abbey, the Conventional Chair of the Abbot of Gresham, and the well-known ecclesiastical seat in St. Mary's, Coventry, which seems as if it had been originally joined to a series of church stalls.

These richly sculptured thrones were probably only made for royal and sacred buildings, as even in the fourteenth century the



Chair in St. Mary's Hall, Coventry; 15th Century.

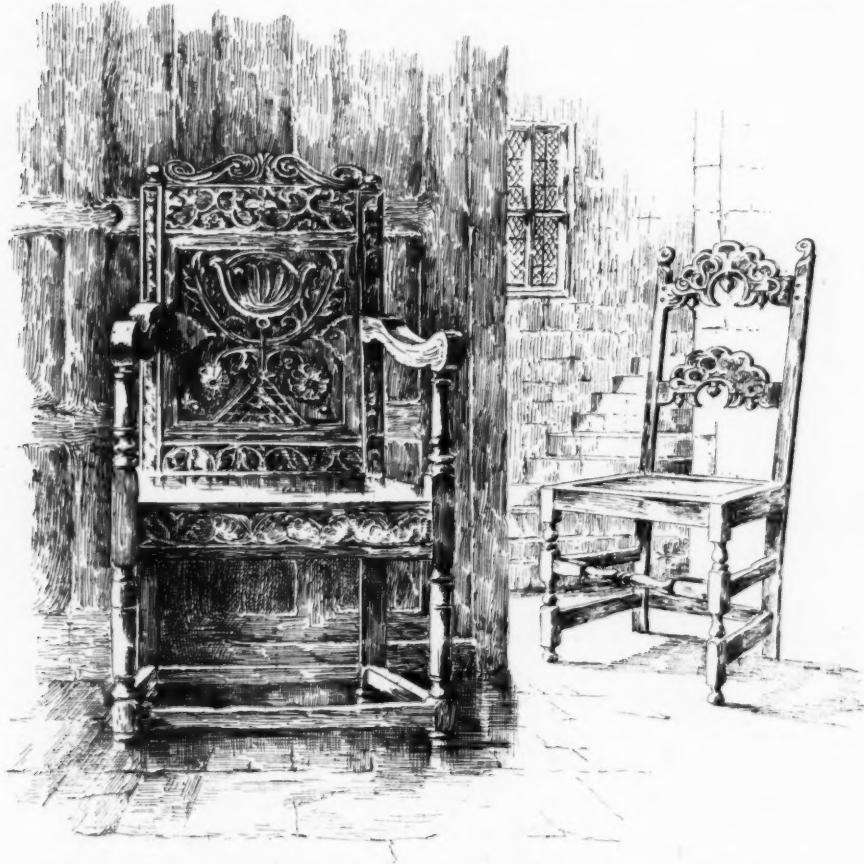
halls of the nobility had little more than fixed benches running down the sides, and our word banquet is believed to be derived from the "bancs" or benches used on such occasions. The portable stools or forms with which the rest of the room was provided could be easily removed for dancing, or when the masquers came round, as the great hall or "house place" was then the common meeting ground for the lord and his retainers before any portions of it had begun to be screened off as a parlor or speaking place, or a "withdrawning room" for conversation, or a dining room for feasting. What chairs there might be were far too heavy to be moved, so were placed on a dais, and covered with a cloth of state and costly cushions, on which the head of the house seated himself on formal occasions. The mistress, though very secondary, was not

altogether ignored, for the raised seats were often made large enough to allow the lady to sit beside her lord. The honor attached to the occupancy of these early chairs is still preserved in our phrases of "taking the chair," and "the dignity of the chairman," for it certainly must have been a distinction to possess such a seat when all the rest of the company were accommodated with movable stools and forms. Indeed, we can hardly realize how scarce chairs were till the Commonwealth leveled all distinctions and gave every man a right to as good a seat as his neighbor.

In the sixteenth century even these scarce chairs were only of rude appearance, depending solely for their outward glory on their embroidered draperies, and these were often so important as to be preserved for successive generations and bequeathed in old wills as of "his own makynge," while "guysns" of velvet and gold embroideries, "Turkie work" and "Tapestree" are constantly mentioned. Chairs with ornamental frames were designated as "forynge work," and the introduction of Italian, or "Romayne" work in England, gave a new character to English furniture. Imported chairs first brought in the fashion of fixed stuffings and coverings, and in the old halls and dining rooms there were generally "two great chayres covered with crimson figured silk and silver" as a compliment to the "high joined stools covered with carpet work and fringed with crewell" like those still to be seen at Knole. When the cushion began to be joined to the framework rich velvet and fringe superseded needle-work, and the quality of the chair denoted the position of the occupant. The Spanish ambassador from Philip the Fourth very proudly records that at a banquet, at which he was present, the king and queen sat on brocaded chairs with cushions, and he and Prince Henry were seated in equal honor on a high tabouret of brocade with a cushion, while the rest of the company were only accommodated on forms.

Once decoration was transferred to the actual frames, carving and inlay were employed, the chairs increased in number and variety, and "Thrown," or turned, "Scrowled" or carved, and "Wainscot" of solid box-like frames were a few of the names by which they were known. These chairs had often richly carved backs, and turned or carved legs, while the design was generally adapted from that of the Flemings, who had settled in England to escape the disturbances in the Netherlands. At this period it is difficult to distinguish between English and foreign productions, though the style became modified later, according to the taste of the English workmen, and assumed a national character in the "spacious times" of the Maiden Queen. Walnut, cypress, lime, cherry and oak were the woods employed, but as oak was the most plentiful and best able to withstand the ravages of time, it is most frequently met with.

Though all the houses of the great landowners, from the latter years of Elizabeth down to the death of James, possessed the same general characteristics, a good deal of diversity was caused by the varying skill of the local craftsmen, and some of the chairs and tables and cabinets are much ruder and rougher than others of the same date. The patterns, too, are equally varied, not only in the furniture, but in the woodwork of the houses, and even in rural parts of Scotland shut off from much communication with the

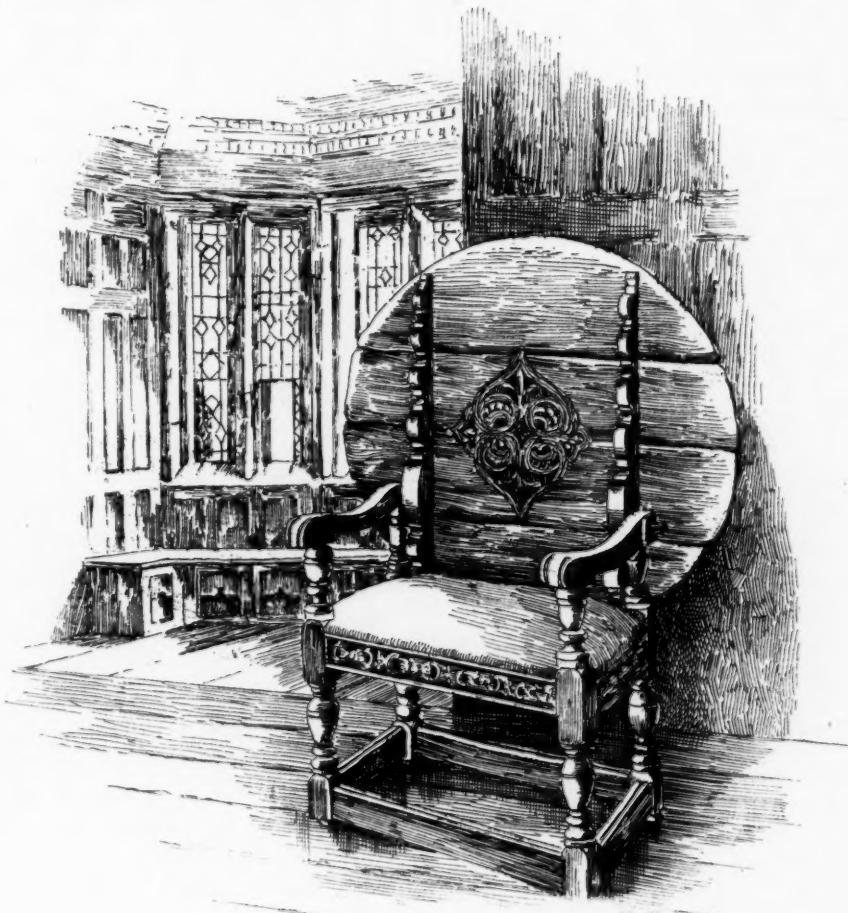


Arm chair with box-seat belonging to Sir Spencer Ponsonby Faul, Brympton Yeo-
vil, and single chair of Yorkshire pattern belonging to Lady Beaumont, Carl-
ton Towers, Selby; both about 1620.

outer world, the oaken shutter-boards which cover the lower parts of the windows are never alike, but exhibit the greatest fertility of design.

Some of these have braved the winters and summers of more than three hundred and fifty years, and are yet in perfect preservation because the joiner work was wrought as the Galashiels' cloth was

said to be warped and woofed, "wi conscience." The first quarter of the seventeenth century was a time of great mercantile prosperity to both kingdoms, for the strife for religious liberty had not begun in Scotland, nor that for civic liberty in England. King James held out an encouraging hand to literature and art, and his reign saw the birth of many new manufactures and much improved decoration.



Old oak table chair; 17th Century.

The houses in these early times were far more magnificent than comfortable, and the want of drainage and the crust of dirt often underlying the grass or rushes on the floor a frequent source of illness and death. Handmade carpets were imported from the East, but they were used entirely for hangings and coverings, so a foot-board was placed between the chair legs to keep the feet in some degree of comfort. When boarded floors rendered it no advantage

to have the front brace so near the ground, it was gradually heightened to give more freedom, while those at the side were raised to the same level. Then, the primary necessity being lost sight of, the braces were gradually dispensed with altogether till the weakest part of the chair was left without any support at all.

It was the custom of our ancestors to make one piece of furniture serve as many purposes as possible, and in Somersetshire especially, chairs and settles are to be found having a table back fastened to the arms, to be turned down when required, while others, frequently from the same country, have box seats, with locked tops concealed by a cushion.



Turned chair of the 17th Century.

The variety of pattern in the single chairs of the seventeenth century is not nearly so great as in the arm, for they were not so numerous. They are mostly of the "Derbyshire" or "Yorkshire" pattern, with solid back bars curved and godrooned, and little acorn ornaments hanging under the bars.

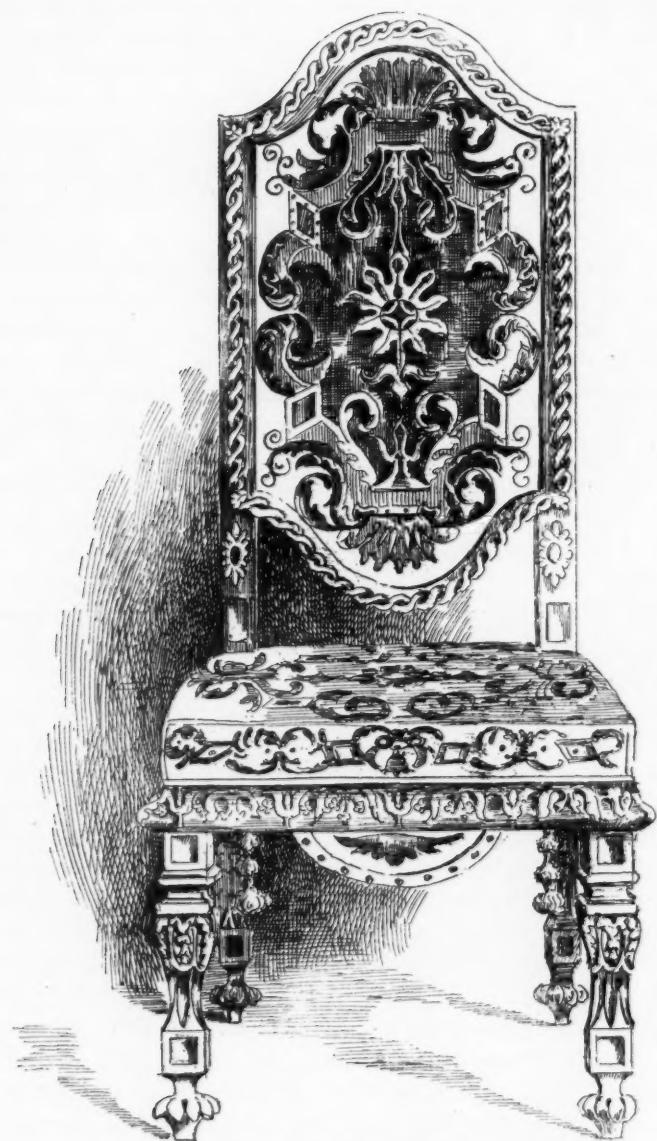
Some of the chairs at Knole are curule shape, two semi-circles reversed, and such folding chairs were carried about in the owner's

carriage, to be used when required. Cane-seated and backed chairs were common, the cane being in fine plats of small and well-worked mesh, and cane may be seen on chairs down to the eighteenth century, when the backs began to be made wholly of wood, as cane was regarded as foreign; and a steady detestation of foreigners and their works, the result of our constant wars, raised up the desire for a more national school.

Chair-making and all domestic arts made a great advance in the time of Charles the First, and if the Civil Wars had not thrown us back, there is no saying to what height of artistic production we might not have attained. Charles, like his father, took a personal interest in all phases of industry, and brought everything to this country which was likely to elevate its art and manufactures. The "wrought backe chairs," and "wicker chairs" in the inventories prove how the different makes were extending. Carving, too, rapidly improved, and the tall chair backs were ornamented with a crown, this the shield or floral festoon, like those in Holyrood Palace, which is peculiarly rich in seats of this description.

The Commonwealth stopped all industrial arts, and the Protector and his Ironsides wrote their characters on the plain, serviceable chairs with brown leather seats, bordered with brass nails, which we call Cromwellian, but which actually came from Holland. They are most dispiriting models, with all unnecessary ornament suppressed, for painting, sculpture and industrial art savored too much of idolatry to be encouraged.

When the king enjoyed his own again, he naturally brought back some of the luxury to which he had become accustomed abroad, and the nation plunged into the opposite extreme. Chairs became elaborately carved and gilded, and the most expensive fabrics called into requisition for their coverings. Much of this furniture was of foreign origin, though there was a considerable portion made in England, especially when the French fugitives after the revocation of the edict of Nantes had founded the silk trade in Spitalfields. The Portuguese Queen brought other influence to bear on English furniture, for the King of Portugal had provided her with one of her chief attractions in her husband's eyes by ceding Bombay, and Indo-Portuguese furniture, for the first time, made its appearance in England. Charles presented such seats to his friends, and some at Penshurst and one in the Ashmolian Museum at Oxford make it easy to tell where the open spiral twist and partly perforated carving originated which was seized on so readily and applied to all sorts of furniture, for the craftsmen profited by the new ideas and new patterns, as well as by the increased demand. But the actual shape of the chair was not much affected. The high backs were still retained, and were filled with open woodwork when



Brocaded velvet chairs from Penshurst; time of Charles II.



Chair in Indo-Portuguese style; time of Charles II.

cane was not used, but as chairs were moved about much more readily than they had formerly been, the lighter material generally filled the seats. Square chairs with Turkey work back and seats, were another type, for rugs from the last were regularly supplied for chair coverings. Luxury had made rapid strides, but none of these seats was comfortable enough for the pleasure-loving nobility, so stuffed chairs, covered with heavily brocaded velvet, were copied from the French, and became the ancestors of our modern arm-chairs.

There is no record, throughout these early years, of any of the craftsmen's names, but it is certain that the architects of the day brought more than an indirect influence to bear on furniture. The decoration which Inigo Jones favored is found on brackets and fireplaces in some of the houses he built, as well as in the furniture, and though there is no documentary evidence to prove that he actually designed movable articles, still as he was Surveyor of the Royal Palaces, and delighted in conducting Masques and preparing scenery, he must have been well acquainted with all the minutiae of his art. In the same way, Wren, if he did not actually design or instruct his workmen how to ornament furniture, had his cherub heads and masses of foliage copied largely in domestic ornament, and the chair of the Brewer's Company strongly recalls his decorative design.

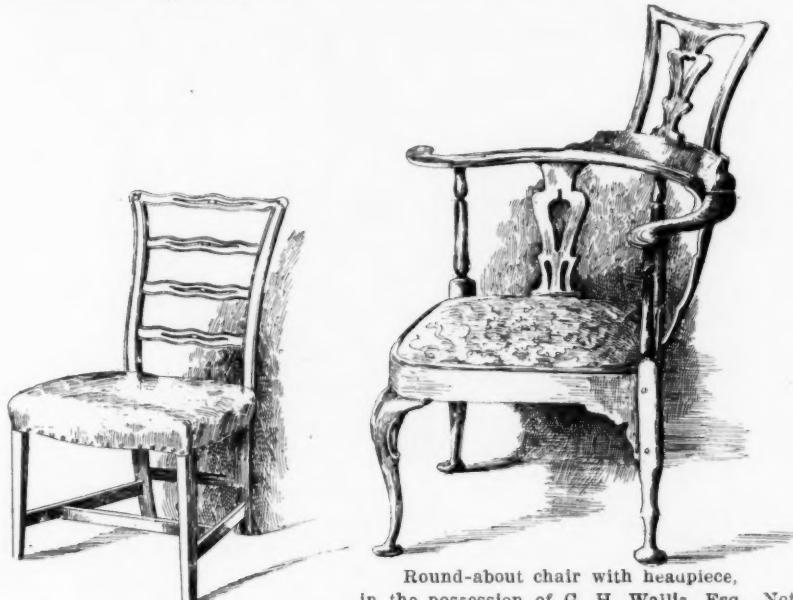
Chairs of turned work, with square or triangular seats, date from about this period in England, though in use much earlier abroad. They were most common in the Cotswold districts, and were frequently made in ash and other home-grown timber, for tough light woods, beech, poplar and ash, were greatly employed in the latter part of the seventeenth century. Hogarth painted such chairs in his pictures of common life, with straight, tapering legs, turned cross-stretchers and side rails, rush seats, and tall backs with upright turned rails or with a varying number of flat slats from side to side. Antiquarians are widely at variance as to their origin, some attributing them to French influence, but though they may have been made after the manner prevailing in Western Europe, still they were undoubtedly manufactured in England, especially in Herefordshire and Gloucestershire, of the timber grown on the hills. Such chairs had become scarce enough by 1761 for Horace Walpole to covet their possession, as he writes to several friends asking them, when in Cheshire, to try and pick up in some of the poor cottages a few of the "ancient wooden chairs, most of them triangular, but all of various patterns, carved and turned in the most whimsical forms, the same as W. Bateman had bought in Herefordshire for a crown apiece." But the quest does not seem to have been successful, or the commission disregarded, for there is no mention of such chairs in the Strawberry Hill Inventory.



Late Jacobean, Queen Anne and Turkey work chairs.

The strong point of English furniture is not its originality, but its catholicity. It is a mirror which reflects the outcome of other times and countries in a frame of its own. The characteristics of Holland were next applied to our seats. Hitherto the legs and backs of the chairs had been straight, with the exception of those based on foreign models. With the advent of the House of Orange the form entirely altered. The backs of the bulging-legged chairs became wider and broader, and we can almost see the burgomaster types of William and Mary's Court in their ampler lines. Though both backs and legs were most often plain, yet the cabriole legs were sometimes finished with shell carving in the knees, while the broad splats had occasionally a little open work, which suggested the "motif" for the subsequent elaboration of Chippendale and his followers. The colored marquetry which came in about this time is usually ascribed entirely to Dutch influence, but it must not be forgotten that the religious wars in France drove large numbers of workmen to Holland, Prussia and England, so the flower inlay of different woods was not altogether without a French derivation. It made but small impression on English furniture, however, and no great change took place in our seats till that most exquisite era, contemporaneous with the best French schools, which we call the Chippendale period. Here, for the first time in our history, English furniture, though still made up of heterogeneous elements, became of such a high order that it was valued above the productions of other countries, and taken abroad to be copied, while the books of design were translated into foreign languages. Chippendale, above all things, was a chairmaker, and his chairs are full of variety, at first with the high back, cabriole leg and claw and ball foot of the so-called Dutch taste. Then rising to lighter fancies, either with vase-shaped ornament, flowing ribbon brows, interlacing frets or Gothic tracery. But what matters it whether the rococo ornament then prevailing on the continent, the Chinese leanings of Sir William Chambers, or Strawberry Hill Gothic were adopted, when the different sources are blended in one harmonious whole? We give Chippendale the first place, simply from his book, for the squat backs and ungainly chairs of Manwaring and the Society of Upholsterers, and the badly designed seats of Ince and Mayhew only serve to accentuate the work of the master hand. Chippendale was probably not the first in point of time, for the unfinished state of the chairs in the Upholsterers' Book seems to indicate an early date before the style was properly formed. Chippendale, Ince, Mayhew and Manwaring were by no means the only designers, for as in the oaken age the furniture lived while the craftsmen sank into oblivion, so in the mahogany era hosts of the makers' names are lost, while their work is merged in that of the few who published illustrated catalogues.

Different versions of the Chippendale chair were rendered all over the country. Strangely enough in Cambridgeshire and the eastern counties, Ince and Mayhew's ladder back predominates. The finest forms prevail in the South and West, while in Scotland the make is heavier, with slightly different tracery, and the old "Luckenbooth" pattern occasionally adopted, of interlacing hearts surmounted by a crown.



Ladder-backed Chippendale chair.

Round-about chair with headpiece,
in the possession of G. H. Wallis, Esq., Not-
tingham; 18th Century.

The number and variety of the chairs of this period are so enormous that it is impossible to do more than allude to the "French Corner Chair," "Back Stool," "Burjour" and other stuffed seats of the early Chippendale school. Upholstered arm chairs grew general later, especially in bedrooms, and were made with wings or side pieces, like Hepplewhite's "Saddle check."

It must not be supposed that there were no other chairs in the century than those to which these designers' names are attached. The familiar "Windsor" were to be seen in every village, though their earliest date is uncertain. The story goes that George III. found one in a hut near Windsor, which a shepherd had hewn with his knife, and the plain shape suiting the simple tastes of "Farmer George" he purchased it and set the fashion. But Lyon, in his Colonial Furniture, disposes of this tradition by proving that Windsor chairs are mentioned in American inventories by 1736.

"Round about," or three-cornered chairs, were made still earlier in the century, and fashioned in all sorts of woods. The back was



Gilded chair designed by Adams, Jr. (Sir A. Hume), and painted Sheraton drawing-room chairs; 18th Century.

sometimes plain, or with fenestrated panels, while the whole chair became afterwards elaborately finished in the style of Chippendale. Some rare specimens have a headpiece rising from the back like that belonging to the curator of the Nottingham Museum, which was presented to him by the late well-known collector, Felix Joseph.

Chippendale's re-introduction of the square leg ought to be noticed, which his successors refined to a tapering support in keeping with the greater lightness and elegance of the classic period. Here the Adams led the way, and though the architect brothers did not make any furniture themselves, Robert designed it largely for the houses they built. It is doubtful if this style would have had any widespread popularity in furniture had not Hepplewhite, Shearer and Sheraton amplified it with less restriction, and many houses,

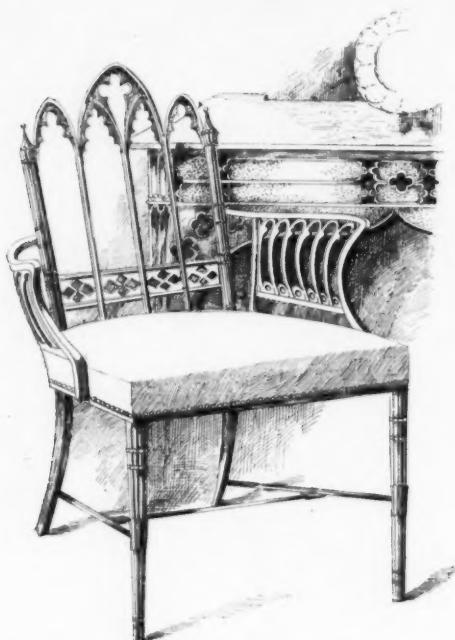


Chippendale* and Hepplewhite chairs; 18th Century.

like Normanton Park, Lord Ancaster's stately home near Stamford, had the furniture supplied by the latter designer.

The shield-shaped back is one of the distinguishing marks of the Hepplewhite chair, though he sometimes adopted oval and even square backs. They are very graceful and delicate, with carved drapery, wheatears or feathers in the shield, and the popularity of the Prince's Party must have been immense, judging from the frequency of feather ornament in the work of Hepplewhite & Sheraton.

Not only did the general form become lighter and more elegant toward the end of the century, but the manner of decoration altered. While Chippendale relied mainly on his chisel, Hepplewhite, besides carving and inlaying, introduced japanning after the style of Vernis-Martin work; and Sheraton, when he had exhausted other forms of ornament, indulged his fancy for brilliant coloring in the most gorgeous painted decoration, mixing it both with inlay and carving. He then passed on to white and gold, in the French style, till at last he finally settled down in his later work to emulating the ormolu mounts and brass inlay of the Napoleonic period. But his glory as a constructor lies in his delicate workmanship and the judicious choice of his woods, and as a decorator



Chippendale chair in Gothic style, belonging to Sir W. Fitz Herbert, Sissington Hall, Derbyshire; 18th Century.

in the color and arrangement of his marquetry and the fact that he never allowed consideration or ornament to affect his work as a whole.

Cane work was again reverted to "for seats" by all this school of designers, though needlework coverings, morocco, striped and variegated horsehair, damasks and finely printed silk, or cotton, became the fashion by turns.

The debased forms of classic which came in as the old school of eighteenth century designers died out had little to recommend it, and how Sheraton, the last of the artist chaimakers, could blind himself enough to adopt it in his later seats, can never be explained. The curved back piece, after a Greek model, which he brought in about 1800, remained the favorite shape of chairs for half a century, though no longer rendered with the brass mounts he intended. Some chairs at Kensington Palace, with Egyptian sphinxes and lion head supports, correspond in date with the victories of British arms in Egypt at the end of the century. The gilded Throne Chair is similar in style, and William Smith, upholsterer to George III. in the early part of this century, is responsible for many such heavy productions. Those of "Anastasius" Hope were even more intensely classic though certainly more refined. But why dwell on this uninteresting cycle, when ponderosity seemed the sole consid-



Chair with flat back piece and brass mounts; about 1800.

eration? The massive framework and heavy scrolls had but a short reign, and though an over-affectation of simplicity afterwards provided us with glorified editions of rush-bottomed Windsor chairs and porters' seats, yet originality of design seemed lost for a period.

K. Warren Clouston.

London, England.



Chair (about 1826) from "Smith's Upholsterers' Guide."



ANGOULÈME CATHEDRAL.—FROM THE SOUTHWEST.

FRENCH CATHEDRALS.—PART XVI.

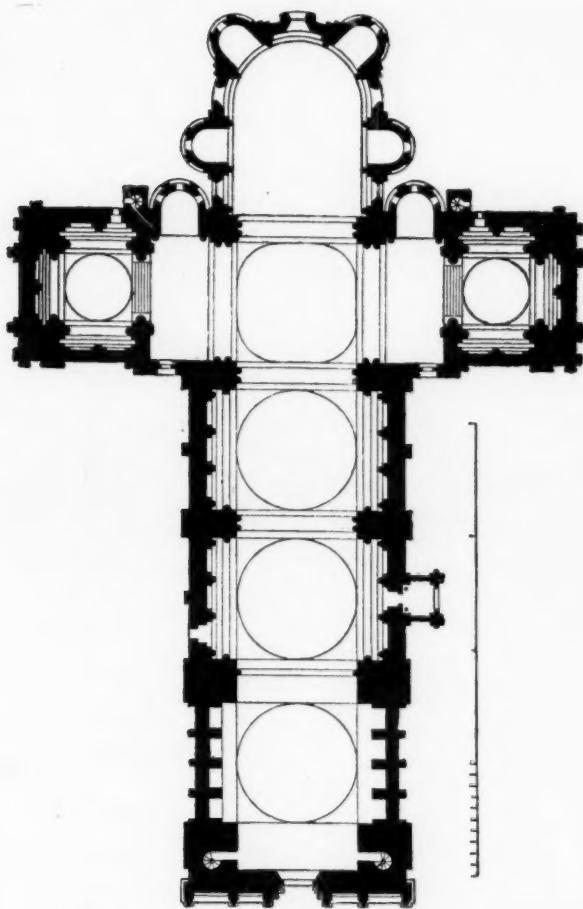
THE DOMED CATHEDRALS. III.

THE CATHEDRAL OF S. PIERRE AT ANGOULÈME.

V.

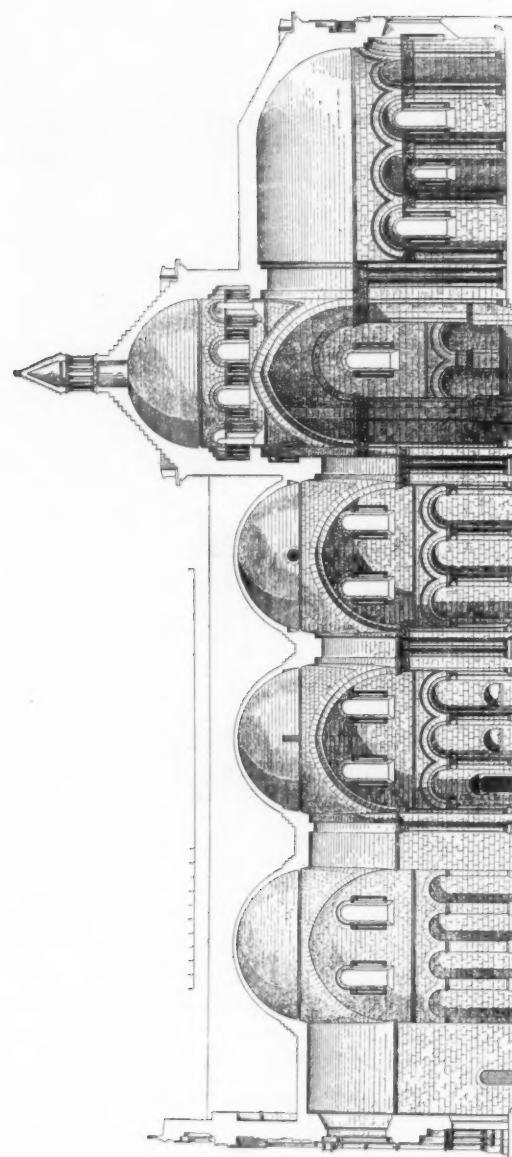
THE cathedral of S. Pierre at Angoulême is special type of domed church. Its plan is a Latin cross, with a broad nave without aisles, divided into three bays, a domed crossing or lantern, two transcents, and a central apse or choir. The nave is of great regularity and symmetry, but the first bay, to the west, plainer and heavier than the others, is the earliest portion, and a survival of a previous cathedral built by Bishop Grimoard and completed as early as 1017. Some discoveries made in the restoration begun in 1854 by M. Warin suggest that the church of which this was a portion may have had the form of a Greek cross.

However this may be, it is an unquestioned fact that the cathedral as we now know it was chiefly due to Gérard II. (1101-1136), one of the most noted French bishops of the twelfth century, a man whose life was spent in constant ecclesiastical turmoil, but who still found time to conduct the building of one of the most important churches

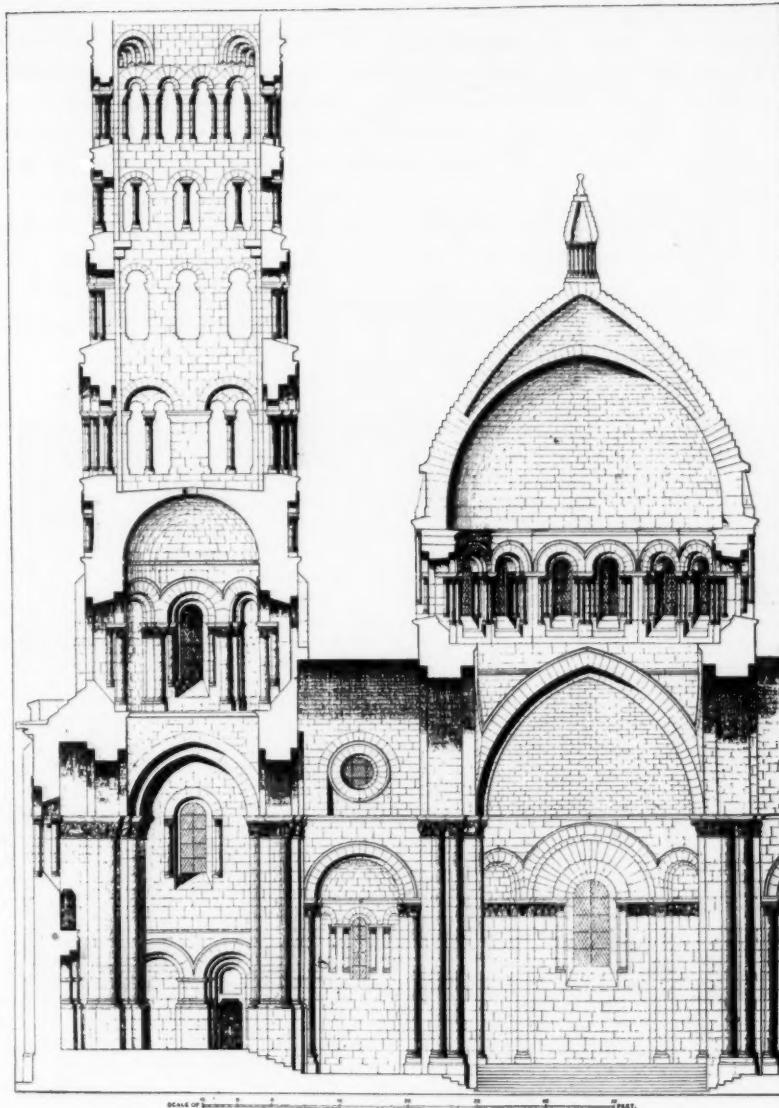


PLAN OF ANGOULEME CATHEDRAL.

of his age. Though he consecrated his cathedral on the 18th of February, 1128, there was much to be done at the time of his death eight years later. The facade above the great window belongs to this later time, and a letter written in 1259 informs us that work was still being done upon it. At this period the tower which surmounted the south crossing was in process of construction, a Gothic structure destroyed by the Protestants in 1569. Some lesser repairs were made during the XIV. and XV. centuries, and at the time of the Protestant agitation the cathedral must have presented a splendid appearance, with its Romanesque tower on the north transept, the Gothic spire on the south transept, and its dome over the crossing. The Protestant wars left it in a sadly disabled state. The south tower was completely overthrown, the northern one greatly injured, the central lantern in a state of collapse, and the beautiful west front



LONGITUDINAL SECTION OF ANGOULÈME CATHEDRAL.



ANGOULÈME CATHEDRAL.—SECTION THROUGH TOWER AND CROSSING.

much defaced. A vigorous effort to repair these injuries was made in the following century by Jean Mesneau, a wealthy canon of the cathedral, who repaired the lantern, cutting windows in all faces of the octagon, though before they were open in four only, and patched up the west front, completing his work with a dedication in 1634. It must be admitted, from early engravings, that the worthy canon was not successful with his facade, but the preservation of the cathedral to our own time is chiefly due to his loving care. A restoration

begun in 1854, and continued by M. Abadie to 1884, has been made with greater care than that architect exhibited at S. Front; the cathedral has, indeed, been largely rebuilt in our own day, but it certainly exhibits a closer approximation to its primitive form than it did before the recent changes, though the central dome has been somewhat heightened, for when first built it was nearly embedded in the tower or lantern.

Though distinguished by great regularity and simplicity the interior of the cathedral of Angoulême exhibits a very considerable advance on the simple interior of the cathedral of Cahors or the daring audacity of S. Front. The bays are separated by large piers whose heavy form is broken by applied columns; on the outer face arranged



ANGOULÈME CATHEDRAL.—THE NAVE.

in pairs to carry the great cross arches between the bays, and single columns on the lateral faces to help carry the side arches. The arches are utterly plain, and built in two planes, the lower supported by the applied columns, the upper rising directly from the piers, the ornament of the capitals of the columns being continued on the pier as a carved base for the arches. The space between the arches is filled with pendentives. A small ornamental band is applied at the base of the domes with which the bays are covered.

The dividing piers form huge internal buttresses, the side walls being decorated with a round arched arcade of three arches, over which is a shallow balcony that is continued from bay to bay by

openings cut in the piers. Two round topped windows in each bay light the nave admirably, yet not so brilliantly as to destroy the effect of the flood of light admitted through the upper windows of the lantern over the crossing, whose arches are much higher than those of the nave, and where the dome is applied to an octagonal base lighted by windows. The transepts are exceedingly effective, being filled with chapels elevated at some distance above the main floor, that in the north transept being lighted by an upper lantern; an ar-



ANGOULÈME CATHEDRAL.—LOOKING INTO THE CROSSING.

rangement much more impressive than the simple apse of the nave, with its four little semi-circular apses, lighted by small windows, and a single window in a flat projection at the head of the apse, which is covered with a deep plain pointed barrel vault ending in a semi-dome.

Few cathedrals in France present so great a contrast between their exteriors and interiors as that of Angoulême. The Romanesque churches we have seen, except S. Trophime at Arles, have shown few features of interest in their exteriors. At Angoulême we

meet, for the first time in the cathedrals, that glorification of the west façade which is one of the distinctive features of French mediaeval ecclesiastical architecture. The side walls of the church are still plain; only the windows enclosed within slight architectural frames, with very shallow plain buttresses between the bays to express and to emphasize the interior construction. The dome, save for its greater size and its high modern tiled roof, is scarcely more notable than the dome of the cathedral of Avignon. But the marvellous



ANGOULEME CATHEDRAL.—VIEW OF APSE AND DOME, NORTH SIDE.

west front, with its rich adornment of sculpture, and the great storied tower on the north transept, mark new elements in church exteriors. At S. Front we had, indeed, a tower, but it is really a structure separated from the body of the cathedral: at S. Trophime we found another, this time over the crossing, and an effort and a very successful one, to emphasize the central point of the church in a way seldom excelled by the Gothic churches. At Angoulême the tower becomes an integral portion of the design, and though not yet on the west façade, where it became the chief feature in Gothic de-

sign, it nevertheless marks a notable step in tower building in France.

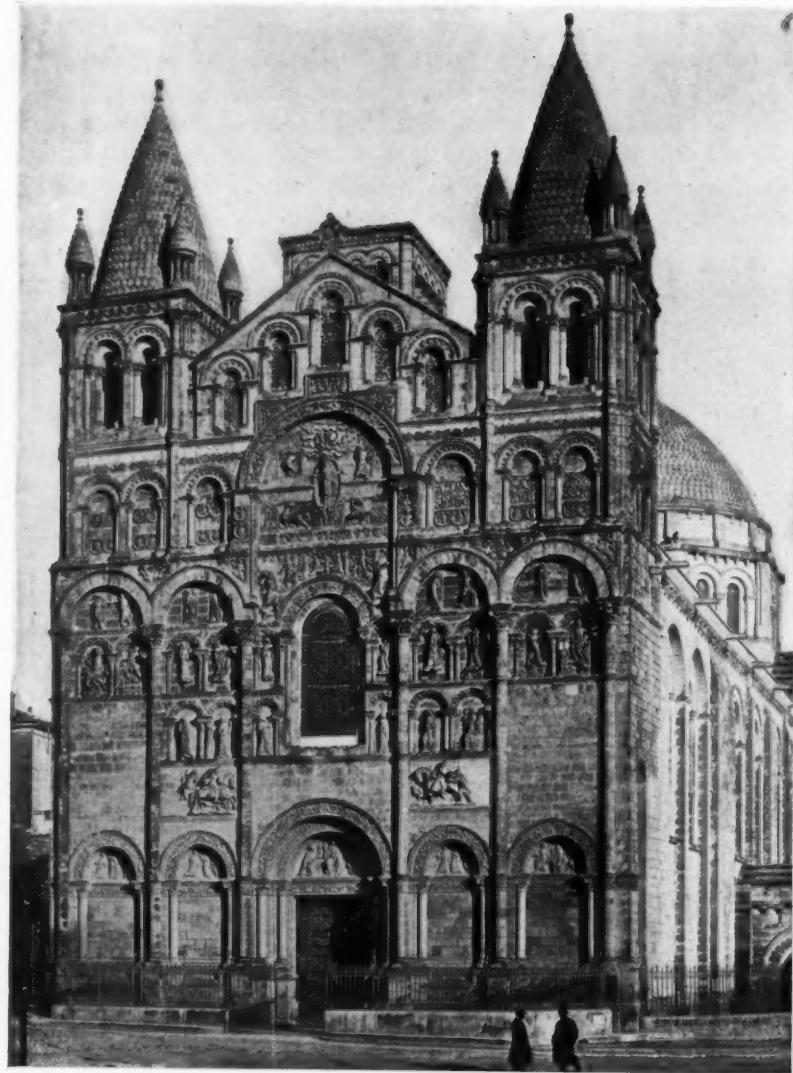
But the great glory of Angoulême cathedral is its west front, which for richness of design, for variety of motif, for splendor of detail, for very strangeness of aspect is only equalled, if surpassed, by the marvellous façade of Notre Dame la Grande at Poitiers. It has been greatly restored by Abadie; but with the exception of the central gable, for which no historical reason exists, it has been most admirably repaired. It is divided into five bays, the central one somewhat wider than the others. Slender applied columns carry small round arches just below the separation of the smaller towers, with which the front is finished. At the base the two side divisions include two



ANGOULEME CATHEDRAL.—ARCH ON WEST FRONT.

smaller lower arches—superb examples of the carving of the locality, with interlaced foliage and strangely grotesqued and intertwined animal forms—within which, in groups of three, are the Apostles. Rude as these reliefs are, their attitudes, costumes and attributes show a considerable power in composition and in technique. The central doorwav, with a larger recessed arch, is similarly treated, but has been much restored.

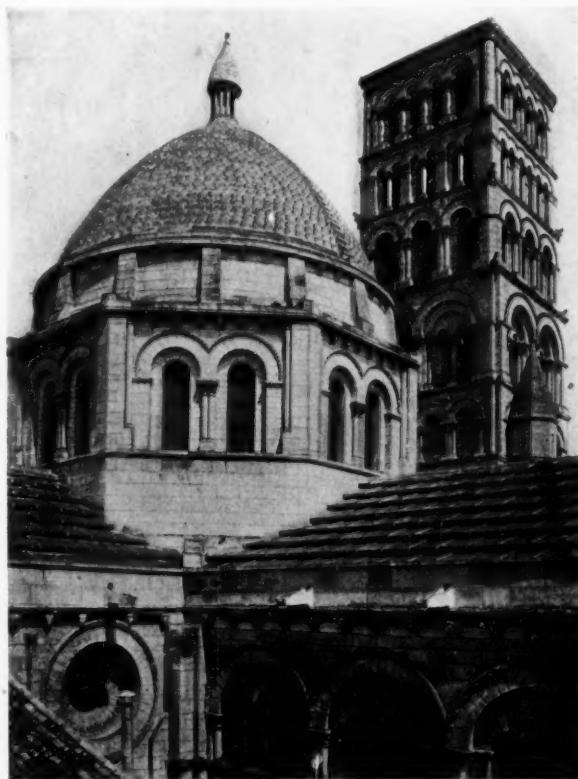
The sculptures of this front form one of the most remarkable series illustrating the Last Judgment to be found in France. That, as we know, was a favorite theme for the main portals, and we have noted many instances where it has been illustrated in the slabs over



ANGOULEME CATHEDRAL.

the main doorway. At S. Trophime it was spread over the rich main porch, but in the cathedral of Angoulême the sculptors went further than they did in any other instance, and used the whole of the wall as a background for the exposition of this theme, at once the most impressive and the most awe-inspiring in Christian theology.

High up on the facade, under the great central arch that rises into the crowning gable, an arch decorated with a series of full length angels, is Christ, the Judge of the world, standing in an aureole, with



ANGOULÈME CATHEDRAL.—VIEW OF DOME AND TOWER.

both arms extended in benediction. A cloud, with cherubim, is above the central figure, and in the surrounding space are disposed the symbols of the Four Evangelists. In the tympanums of the lower great arches are the dead, risen from their graves, two under each arch; and above them and over the central window, are the angels sounding the last trump and pointing to the grand figure of Christ above. The smaller arches on each side contain many small medallion heads of the blessed already entered into bliss. Still lower



ANGOULÈME CATHEDRAL; RESTORATION.

The tower on the south transept does not exist; originally this was a Gothic spire and not as here shown.

down, under the side arches, and standing within smaller ones, are five Doctors of the New Law, and a woman who may represent the Queen of Sheba. Statues of the Prophets are under arches within the bays immediately adjoining the central bay, and also in niches on each side of the great window. Then, below are two reliefs, modern restorations, one representing S. George and the Dragon, the other S. Martin giving his cloak to a beggar.

The scheme of the sculptures is complete and arranged with consummate skill; their decorative aspects are not less remarkable. A complicated theme has been applied to a very large surface, consisting of many separated parts, and yet the effect and meaning of the whole is unmistakable. Splendid as the sculptures are, and impressive as is their arrangement, the wonderful detail that surrounds them, the carving of the capitals, the elaborate bands, the panels, the medallions, produce an ensemble of marvellous richness and variety. The cathedrals of France offer few more notable monuments than this front of Angoulême, and the student of ecclesiastical sculpture will find few examples more worthy of study than the marvellous sculptures that for more than 600 years have looked down from these walls.

And the cathedral is superbly situated. It is not, it is true, on the highest point within the city; but it stands at the apex of the most closely built portion, a higher hill before it rising in a rather flat slope. The cathedral stands out boldly, showing the south side completely and nearly the whole of the remarkable west front, which is finely viewed from the open space before it. On each side of the nave is a sunken space, forming a sort of garden, through which the side portals are entered; that on the south side is open; that on the north is closed. The palace of the bishop, built originally by Gerard, the builder of the cathedral, adjoins it to the east, the episcopal gardens enclosing the choir. From thence one may study the great tower, rising in story upon story of decorated arches, as well as the choir with its four little apses. The upper wall of this part, treated as a closed clearstory, with an arcade of round arches containing pairs of smaller arches, is the only portion of the cathedral wall, save the façade, that has been designed with special reference to architectural effect. The west front dominate the cathedral, as it does in all French churches, but the other portions of the exterior are not the less interesting nor the less expressive of their time and place because of the splendid façade.

Barr Ferree.



THE TALL OFFICE BUILDING SECTION OF NEW YORK CITY.
Washington Life Building in front.
Cyrus L. W. Eidlitz, Architect.

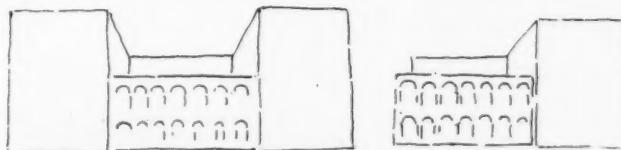
PRINCIPLES OF ARCHITECTURAL COMPOSITION.*

IV.

Grouping of Subordinate Parts.

HITHERTO, although we have given our rules a general application, we have spoken only of the instances in which the masses to be grouped themselves constituted the building.

We are to speak now of masses that are parts of a building in a somewhat different sense. In the former case, indeed, the masses to be grouped were necessarily parts of the whole; but none could be taken away without leaving the building a fragment only. The Pitti palace, for instance, on one side is a group of two pavilions. If one be taken away there remains, not a building with one pavilion, but a fragment of a complete building, as seen in this diagrammatic sketch (46).



46. Sketch of a group of two principal masses; neither can be removed and leave a complete design.

If, however, the parts are such that they may be removed without destroying the completeness of the main mass or group of masses, they are properly regarded as subordinate parts. Thus the two dormers in 47 may be removed, yet still leave a complete single mass.



47. Old building at Lisieux. A single mass with two subordinate masses, so classed because one or both may be removed, yet leave a complete design.

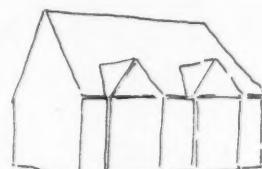
All that we have said with regard to the grouping of the main masses applies to that of subordinate parts, with some slight modifications.

*Continued from Vol. VIII. No. 1.

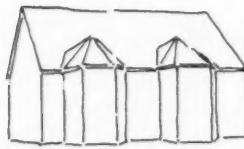
If, instead of making our two gables the chief part of the design, we apply them to a larger mass which has been previously created, we at once have the second step in a design (49). To begin with, we had a roofed mass, gabled at each end, straight at the side (48). For some reason we wanted to develop further the side. Adding the two gables makes a more complex design of the side, leaving the singleness of the main mass untouched. We may, if we prefer, add



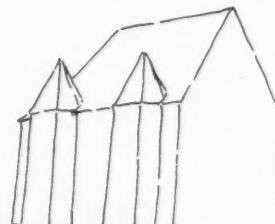
48. A single mass without subordinate parts.



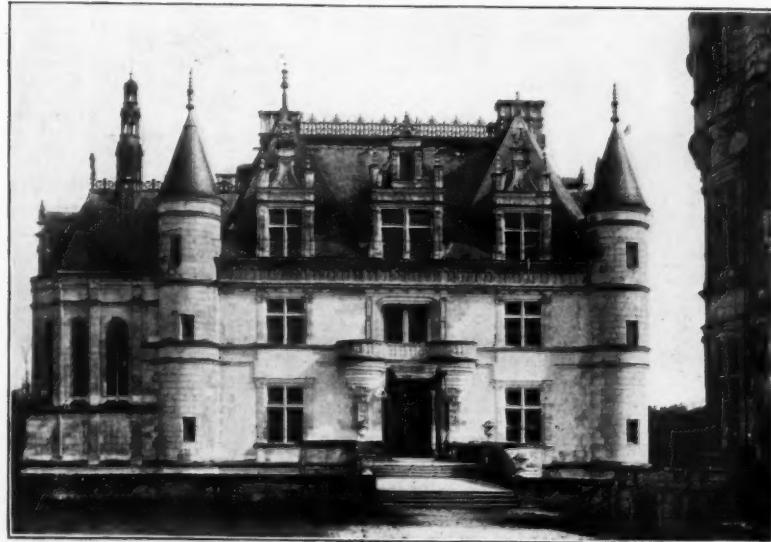
49. The same, with two subordinate gables.



50. The same, with two subordinate bays.



51. The same, both the bays and the main mass having steeper roofs.



52. Chenonceaux. A fine example of both double and triple Subordinate Masses, the two turrets and the three dormers.

two bay-windows, low and wide, like 50, or tall and narrow, like 51: the homology of the designs is evident at a glance. Here is a view, 52,

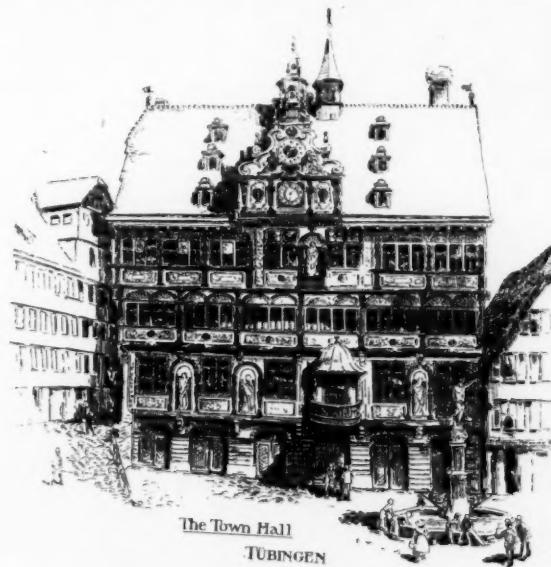


53. A single central subordinate part.



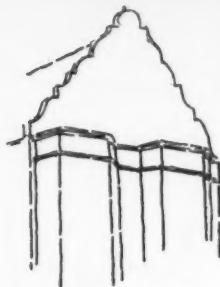
54. A single subordinate part, unsymmetrically placed.

of the Castle of Chenonceaux, showing a double grouping of turrets as subordinate masses, also a triple group of dormers, but nothing that compares with the bulk of the main wall and roof. Instead of two gables or bays, one gable or bay, either central or lateral, would make a satisfactory design, 53, 54, 55; or, if we want to put two subordinate features on the gable end of our main mass, we

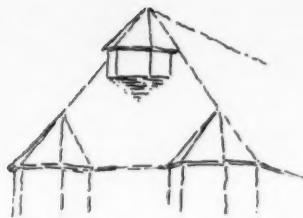


55. The large dormer constitutes a single subordinate mass.

may do so, providing we know what we are about, and either assert our one main pointed mass, by making the two things square-topped (56), or make it a triple treatment out-and-out, by capping all three parts alike as at 57. Here in 58 is a triple group, a gable and two dormers, all treated alike, and in 59 a group of three turrets in which the fault is that they are too big for subordinate masses and not big enough for principal. Hardly anything is more effective than a single large feature upon the main mass. Such a



56. A group of two subordinate bays.



57. The same in plan, converted into a triple group by the addition of the oriel.



58. The Rathaus, Bremen. A group of three gables upon the larger single mass of the building.



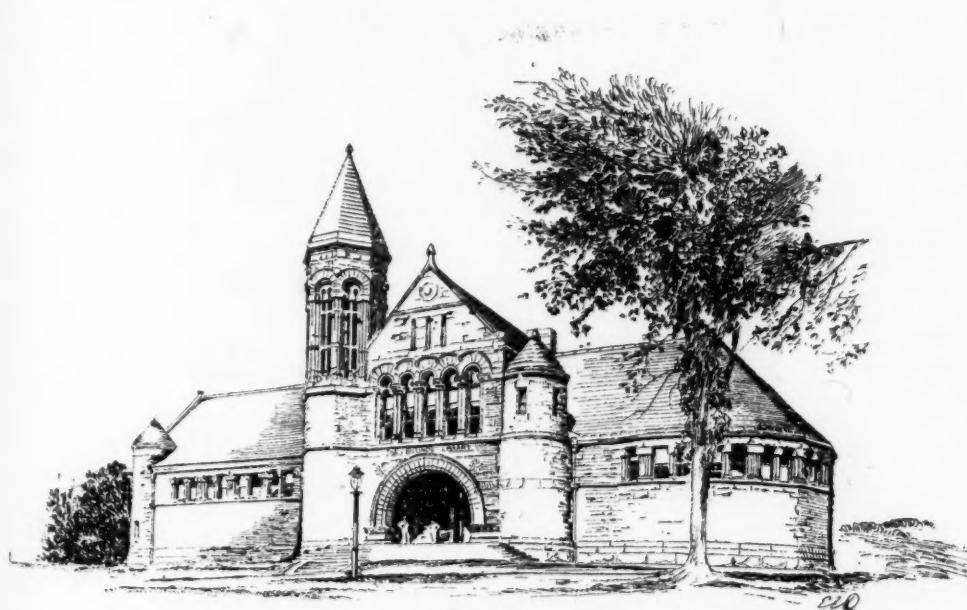
59. La Trinité, Paris. A group of three turrets.



60. A single mass with a single subordinate mass.



61. The same as the foregoing.



62. Billing's Library, Burlington, Vt. H. H. Richardson, Architect. The gable is the principal mass in this composition. The taller tower is a single subordinate mass placed unsymmetrically. It is to be regarded as single because the smaller and rather anomalous tower is not large enough to constitute with the other a group of two.

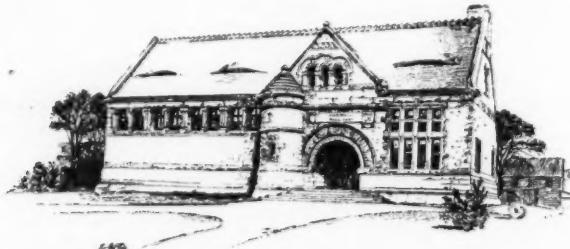
dormer as this (60) is analogous to the single tower upon the Palazzo Vecchio at Florence—the largest thing upon it, yet not large enough to dominate it. Here in 61, is a rustic cottage, redeemed and made beautiful by a single octagon turret-roofed bay.

Such a single feature may also be placed unsymmetrically without loss of either effect or dignity, as the tourelle at 62 and the tower at 63.



63. A single tower placed unsymmetrically.

Two more instances of a single subordinate feature are shown in 64 and 65.



64. Crane Library, Quincy, Mass. H. H. Richardson, Architect. A much better example of a single unsymmetrical mass than is the Billings' Library, 62. The gable is a subordinate mass upon the building and the turret upon the gable, both arranged unsymmetrically.

Returning, for a moment, to our groups of two—besides the equal couplet, we may use the couplet of unequals even more freely and with even better appearance for subordinate than for main

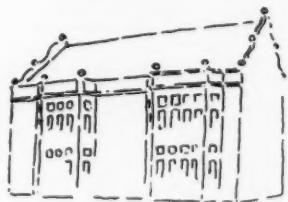


65. Library, North Easton, Mass. H. H. Richardson, Architect. Here again the gable is a subordinate mass upon the building and the tower is the same with respect to the gable.



66. A group of two unequal subordinate masses.

masses. Such an unequal couplet is sketched at 66, and it is seen in the well-known Rathhaus at Rottenburg, 67. Hardly any motive is more available for modern work; whether it be a shingled cottage with bays suggesting towers (66), or a brick and stone house, with wide English-fashion bays, like 68, or even pedimented masses like these at 69.



68. Two unequal subordinate masses.



69. The same as 68.



67. Rathhaus, Rothenburg. The turrets are double unequal subordinate masses.

So far, the grouping of subordinate parts is strictly analogous to that of main masses. Instead of having to connect them, however, by linking masses, smaller than the main masses themselves, they are already connected by the larger main masses, which serve, as it were, as a background upon which the subordinate parts occur.



70. Residence, Frank Hall, Hampstead, London. R. Norman Shaw, Architect. An example of three equal subordinate gables.

When we come to three subordinate objects, the analogy maintains, with one difference: in groups of three masses, one must be larger than the others; in subordinate groups, three things of equal size make a harmony, as well as three things where one predominates. Three equal dormers do very well; so do three equal gables, as 70, 71, 72. But here we are on a precipice. Three equal bays (73)



71. An Old House, at Canterbury. Three subordinate gables, equal in effect. The gradation in size is perhaps for perspective exaggeration.

can be made acceptable only by great care. If they are just right, they may be charming; if they are wrong, they will not do at all. Just right and just wrong means this: just right is where the main mass predominates; just wrong is where it fails to predominate. In the latter case the three subordinate masses appear as a group of main masses, and fail to look well owing to their equality.

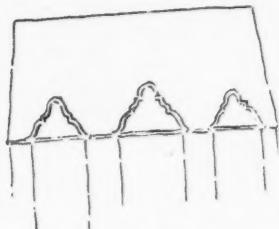


72. House at Cambridge, Mass. The dormers are three equal subordinate masses; the porch a single subordinate mass.

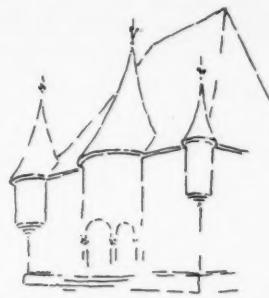


73. Group of three equal bays.

But if we have our group of three with one bigger than the others, all is well. We may do much as we please, all is sure to be well, as far as the number of things is concerned, whether the triplet be symmetrical, as at 74, or unsymmetrical, as at 75.



74. Three gables, the largest in the centre.



75. Three tourelles, the largest in the centre.

There is another sort of subordinate parts that we must call attention to, although briefly, as the same rules apply to it as to the rest, and to reiterate them would be profitless. It comprises main masses that are divided into parts directly, instead of the parts being placed upon them as backgrounds. Such a case is shown at 76, 77, where the mass is cut up into three gables, instead of three gables being placed upon the mass, at 74.

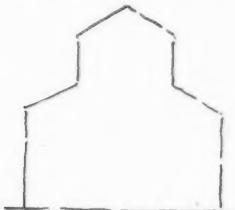


76. Three gables set close together.

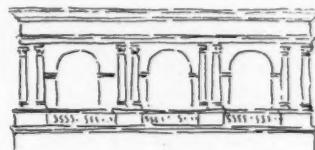


77. Cathedral, Sienna. The façade is an example of three unequal gables.

Here is another grouping (78), which we are not yet able to classify, but shall be hereafter; and another (79), perhaps premature, where detail is used to effect the subdivision of the mass. But the great difference between the grouping of main masses and of sub-

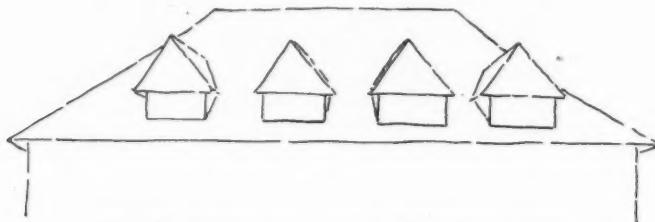


78. Mass with two appendages, to be spoken of hereafter.



79. Three bays.

ordinate parts, is that in the former, more than three parts are not to be used, unless the parts, should they exceed three, are thrown together into groups of twos and threes, as we have said; while in



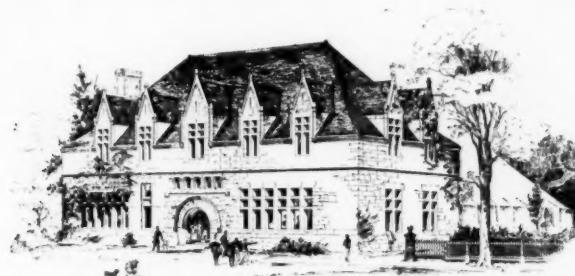
80. The dormers are a row of subordinate masses.



81. The same. The projection of one gable does not prevent its grouping with the others. There is also a group of three bays between the gables.

arranging our subordinate parts, we continually have to use four or more objects. Nothing could be desired better than a row of four dormers, like this (80), for example, and the reason is that we think of it collectively, as one row and not as four individuals. Here, again, is a row of four gables, 81.

There might be five or six or more, the result would be substantially the same; the exact number to be used if in excess of three being determined by other circumstances. It is as well to note, however, that uneven numbers in rows have more individuality and

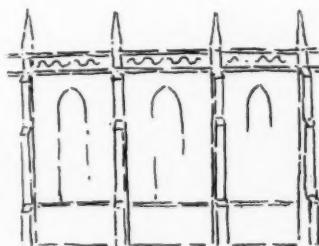


82. Design for Building for Horticultural Society and Park Commission, Boston, Mass.
A row of five dormers, the central slightly larger.

less continuity than even numbers; if we had put five dormers, it would have given more sense of a group of individuals, the eye naturally picking out the central object and regarding the rest as grouped on each side of it (82).

In almost all buildings four or more parts are used on the sides, although usually these parts are hardly important enough to be called subordinate masses, but are merely details, windows, arches, and the like. Yet when, by the use of these details the mass is separated into parts, the parts are naturally classified as subordinate parts, and distinct from the details that mark them.

Thus, a wall, cut up by Gothic buttresses or Renaissance pilas-



83. Subordinate parts obtained by separation of the main mass by details.



84. The same as 83.

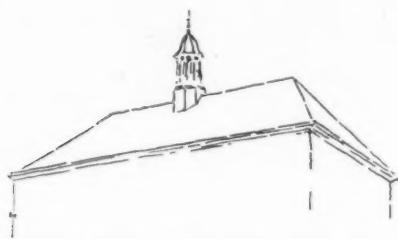
ters, is separated into parts that are distinct from the details—buttresses or pilasters—that define them, as in 83 and 84.

We may then say as follows:

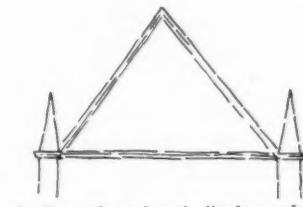
Rule VII. Although four main masses may never be used as a group, four subordinate masses may be used upon a main mass, whenever a sense of continuity is required.

There is one more sort of subordinate parts that we must allude to, besides those that are applied to the front or sides; it includes those that are set upon the top of the main mass, which becomes a sort of base for them—fleches, belvideres, belfries, pinnacles—everything of the sort that is not too big; if it be too large, the objects becomes itself the main mass, as a great dome or tower.

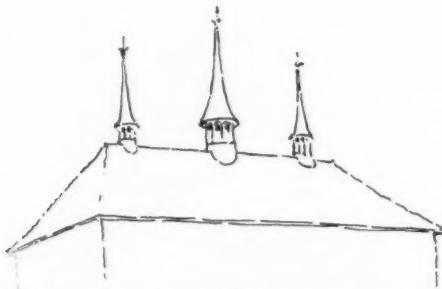
Such things are used in quite analogous ways to those that we have before spoken of; indeed, many dormers, when seen so near as to bring them against the sky-line, are evidently closely allied to such things as belfries. We may plant them on one, two or three



85. A single belfry used as a subordinate mass.



86. Two pinnacles similarly used.



87. Three ventilators, similarly used.

(85, 86, 87), and, by making one much the largest, just as in the case of main masses, we may use various groupings as our fancy suggests, as well with these objects applied to the roof as with the bays, oriels, and other subordinate masses, that are naturally applied to the side.

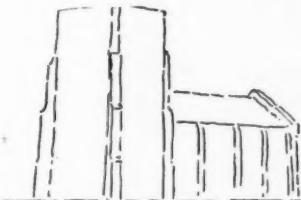
V.

Appendages.

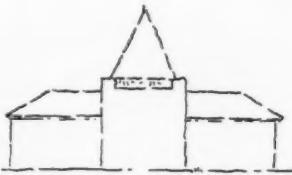
Hitherto we have spoken of but two kinds of main masses—individual units and the linking masses that we use to connect them. This is not quite all that there are in architectural compositions; we must describe one more kind, and that will comprise them all.

The masses that are now spoken of are those which are attached to a main mass, but do not connect any other main mass with it.

A tower with a building attached, as long as the tower is as important as, or more important than the building, is a case of a mass with a single appendage (88). Where there is one on each side, as at 89, it is a mass with two appendages. Several examples are given of both single, 90, 91; and double, 92, 93, 94, 95, 96, 97, appendages.



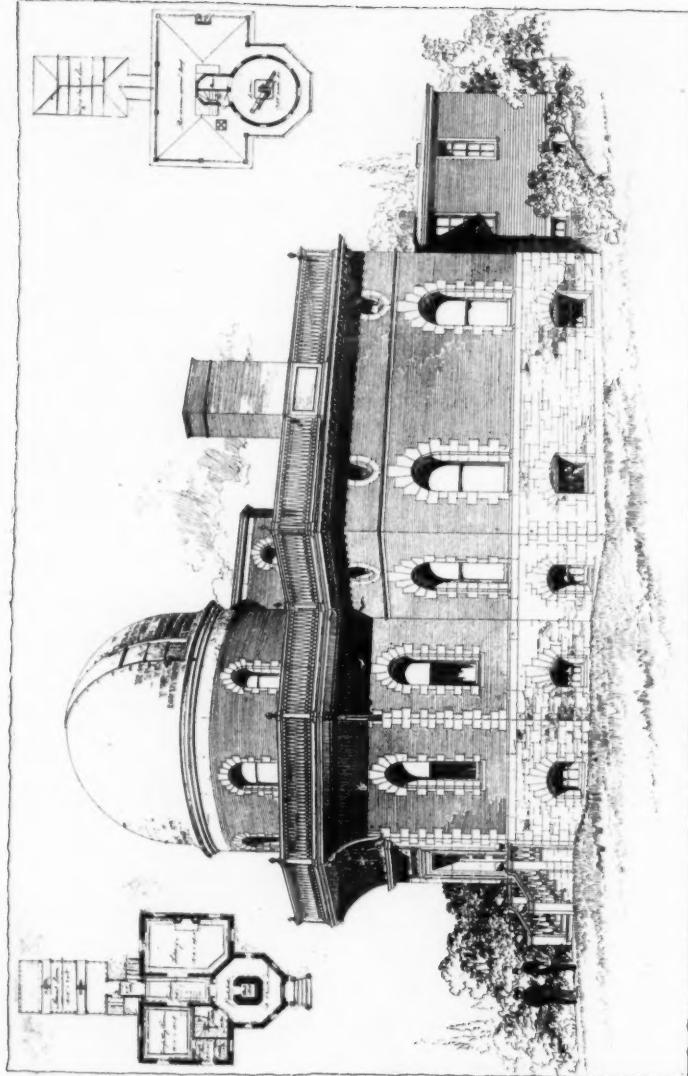
88. Mass, with one appendage.



89. Mass, with two appendages.



90. Mass, with a single appendage. The one-story portion on the left side is the appendage.



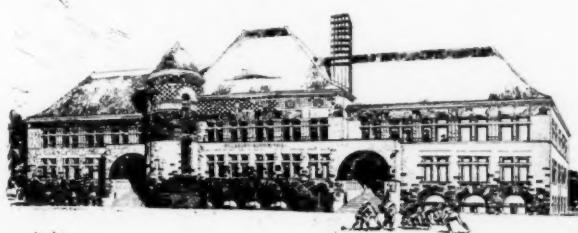
91. Sketch for the Ladd Observatory, Brown University, Providence, R. I. Single mass with an appendage.
The dome is the main mass, the part on the right the appendage.



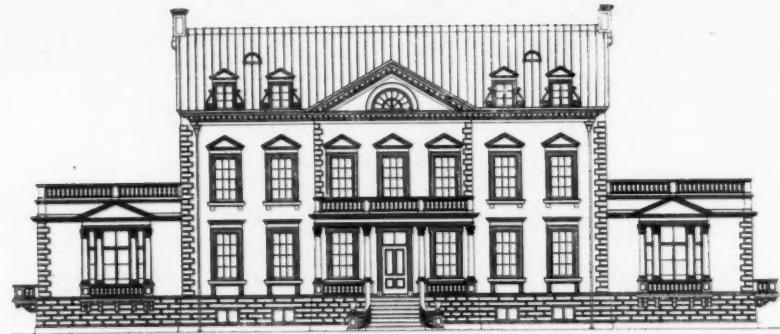
92. Fontana di Trevi, Rome. The central pavilion is the main mass, the wings are the two appendages.



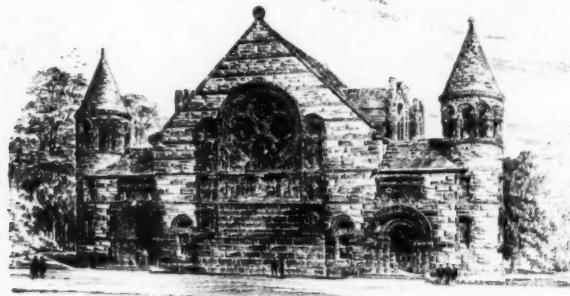
93. The group of double gables with central link is the main mass. The wings are appendages.



94. Pillsbury Science Hall, Minneapolis. L. S. Buffington, Architect. The high central part is the main mass. The tower is an unsymmetrical subordinate mass. The wings are two appendages.



95. The Van Rensselaer Manor House, Albany, N. Y. Single mass with two appendages.



96. The Commencement Hall, Princeton, N. J. Wm. A. Potter, Architect. The same as 95.



97. Norwich Cathedral, East Front. The central gable is the mass; the square-topped aisles are the appendages.

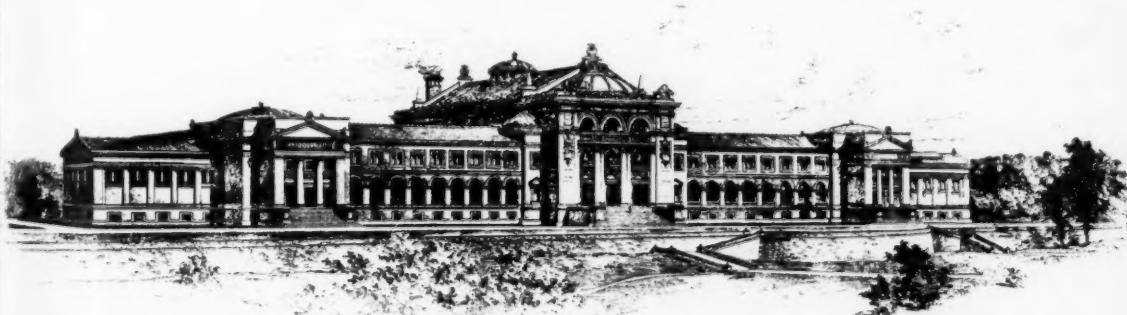
Westminster Palace that we have already spoken of, is, as a whole, an appendage of the great tower, as we remarked at the time; and our own Madison Square Garden is another specimen (98).



98. Sketch of Madison Square Garden, showing how from one point it groups as a mass with one appendage.

Very often a group that from one point of view is a mass with one appendage, from another has two appendages, as in this last case of Madison Square Garden, and in many churches.

Nor is it necessary that the appendages be long and low, 99. To a tower may be added a tall and narrow appendage, as at 100, or to a group of two towers, either one appendage, or two appendages,



99. Triple group, with two appendages—the end portions beyond the flanking pavilions are the appendages.



100. A single tower with a single tall appendage.



101. Group of two towers with two appendages.



102. A tower with two appendages, and one subordinate mass.

as at 101. But more than two appendages we cannot very well manage, because, if we put a third appendage coming out to the front, it is not as an appendage that it appears, but as a central subordinate mass, as in 102; while if it projects behind, we do not see it at all, and it might as well not exist as far as the composition of the front is concerned. We might, indeed, run them out diagonally, and this is sometimes done, but only in special cases, where the main motive is so large that we are at liberty to do anything, or where other special conditions prevail.

To any of the previously enumerated groups, either one or two appendages may be attached, either of the same size and character, or of different sizes and characters; although here we come to the line again, where the increasing complexity of the group requires more skill in adjusting the various parts.

At 103 is a twin group with symmetrical appendages; at 104 a husband-and-wife group with unsymmetrical, and at 105 another double unequal group with one appendage; 106 shows an unsymmetrical triple group, with unsymmetrical appendages; 107 the possibility of doing the same sort of thing with pedimented orders.



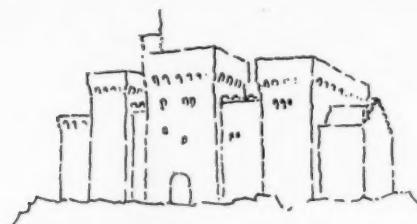
103. Double equal group with two equal appendages.



104. Double unequal, with unequal appendages.



105. Hennebont—Notre Dame du Paradis. Group of two unequal masses with one appendage.



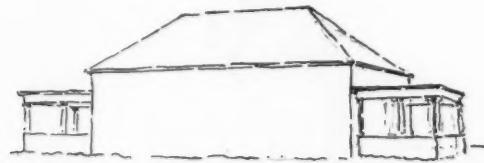
106. Triple unsymmetrical group with appendages, also unsymmetrical.



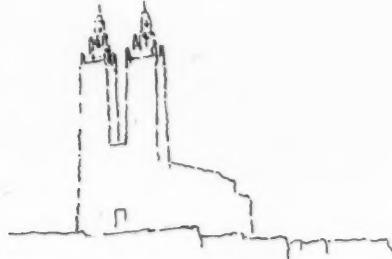
107. The same as 106.

At 108 is a motive for a modern country-house, with open, square piazzas attached; and at 109 a double mass with one appendage, a reminiscence of Messrs. Carrère and Hastings' design for St. John's cathedral church—an extremely fine thing, in its way.

Although less usually attached to subordinate parts, yet, when desired, appendages may be used in much the same way.

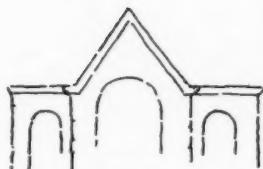


108. House with piazzas attached as appendages.



109. Double tower, with the building as a single appendage.

A porch, for example, may be made like 110, a dormer like 111, and so through the list, even unsymmetrical appendages being available with due skill, for details as well as for masses.

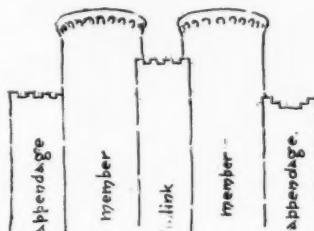


110. A porch with two appendages.



111. A dormer with two appendages.

One or two points to be observed in the use of appendages we may mention. When attached to a group of objects, the appendages must be smaller—not only than any of the objects that form the group, but than the parts which form the connecting links, as at 112.

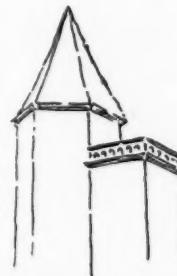


112. Diagram showing relative importance of link and appendage.

Besides this, appendages must usually be different, to some extent, in shape from the masses to which they are attached. Thus, at figure 113, the smaller tower, although of the same relative size, and in the same relative position as in 114, is, just like the large tower, octagonal in plan, and high-peaked as to the roof; while in 114 it is square in plan and square-topped. The effect of 113 is rather that of a group of two unequal, while 114 is plainly a single mass, with an attached appendage.

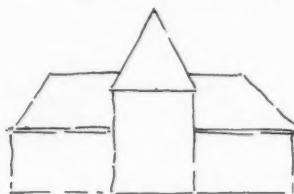


113. An appendage treated like the main mass.



114. An appendage treated differently from the main mass.

Sometimes, however, other considerations require the use of similar treatment for appendages, as in 115 and 116, with the same object of accenting their connection with the principal mass.



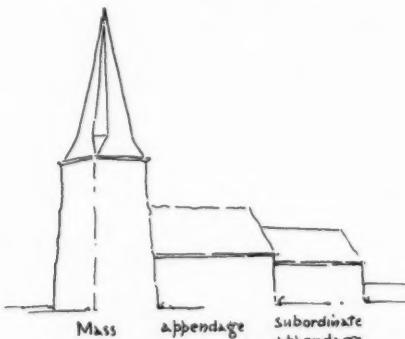
115. Appendages and main mass treated alike.



116. English High School, Cambridge, Mass. Mass with two appendages all roofed alike.

In stating a rule, we are obliged to reserve somewhat. Likeness of treatment must be left, for the time, for the exigencies of the case to settle. But we may lay down the law in this way—good as far as it goes.

Rule VIII. Appendages must be smaller than the members or the linking parts of the groups to which they are attached, and in treatment usually different from the members of the group.



117. An appendage of an appendage.

Finally, appendages themselves may have appendages, as in many a village church, like 117 in general outline.

VI.

Grouping of Details.

We now come to a part of design-making, which, although less important in theory than the fundamental dispositions, is in practice more important; the grouping of details, such as cannot be classed even as subordinate masses, doors, arches, windows, pinnacles, columns, and ultimately, escutcheons, pateræ, festoons, and all the rest of the minor materials of architecture; omitting for the present, cornices, mouldings and such horizontal details, which we shall leave until we have spoken of horizontal subdivision.

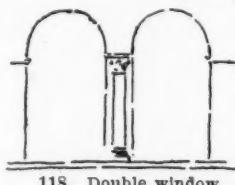
It is, moreover, in practice more important, because very often an objectionable arrangement of masses, forced upon us by circumstances, may be redeemed by skilful detail; and because the volume of possible detail is so great, that the greater part of the time and skill of the architect are necessarily spent upon it.

Details are subject to the same rules, in substance, as principal and subordinate masses, with one important difference and some minor modifications.

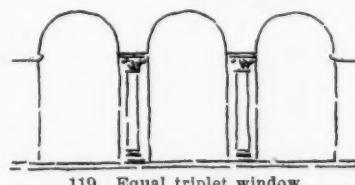
In the first place, groups of details, while composed of individual parts, do not usually have linking parts, but are connected merely by juxtaposition. In the second place, symmetry is almost essential in detail grouping.

The first of these modifications is partly due to this, that the portion of the building itself, upon which the details occur, is a sufficient bond of connection; partly to this other, that the forms of the details themselves usually permit a partial merging of them together, constituting a very satisfactory union.

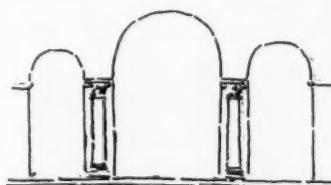
The details to be grouped are, for the most part, openings—doors, windows and intercolumniations; while the solids, the piers and the columns count only as the boundaries of openings.



118. Double window.



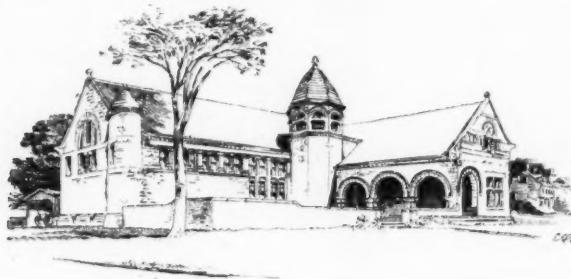
119. Equal triplet window.



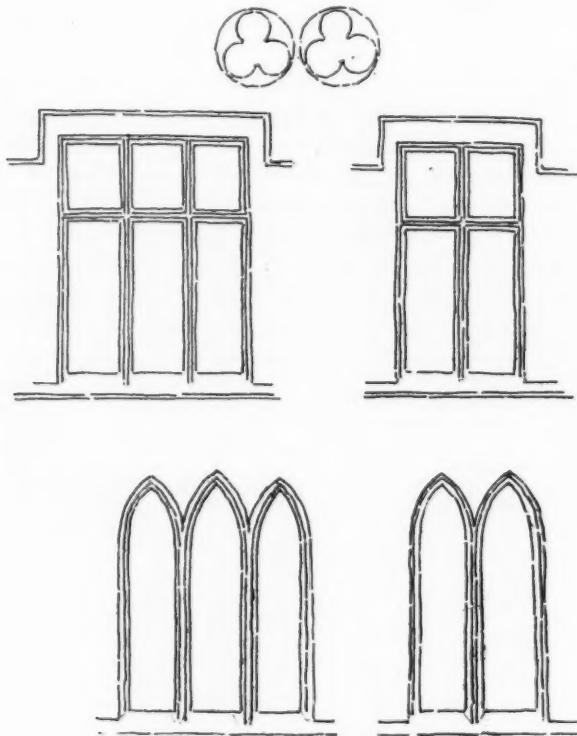
120. Unequal triplet window.

Windows, we may, of course, use singly, or in couplets (118), or in triplets, either equal (119) or unequal, with the largest in the middle (120). Yet, even when we use triplets of equals, so strong is the demand of the eye that the middle one should be the largest, that if we make it precisely equal, it will appear to be smaller than the others; we must make it just a little—unnoticeably—larger, but, to the eye, the same, 121.

All kinds of windows may be thus grouped in twos and threes, square-headed, pointed and round-arched, and even circular, or trefoil, 122.



121. Converse Memorial Library, Malden, Mass. H. H. Richardson, Architect. The central arch of the arcade may be seen to be larger than the others.



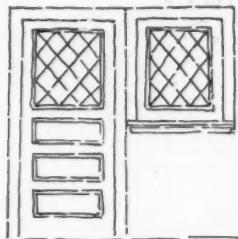
122. Various couplet and triplet windows.



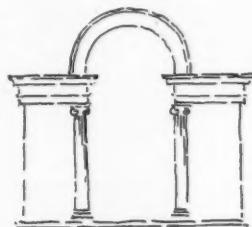
124. House, Place des Halles, Orléans, France. Not only the arches of the first story but the windows above are double unequal groups. It would improve the composition to omit the anomalous niches in the upper stories.

So may doors, if necessary, be grouped, and all other similar details.

In special situations, too, unsymmetrical groups may be formed, like this door and window couplet (123), and compositions more or less elaborate may be made, quite analogous to those of masses. In 124 a rather remarkable instance of unsymmetrical grouping of details is shown.



123. Double unequal details.

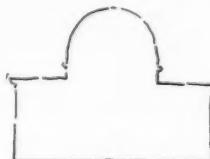


125. Triple unequal openings.

In 125, we have the outline of the familiar Palladian window, one of the most graceful combinations ever made. It is a single mass, with two appendages, just the same composition as St. Peter's (126), or any other single domed building (127). And more complex combinations may be made, if required.



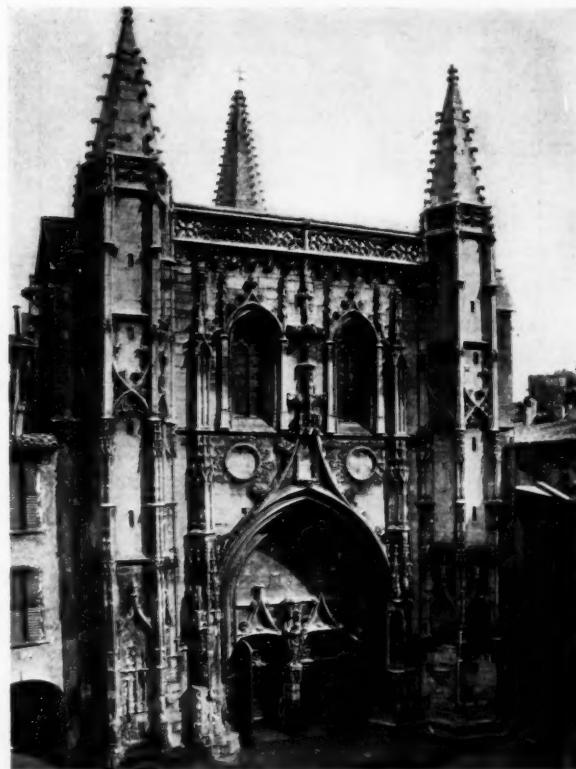
126. St. Peter's, Rome. In outline the great dome is the mass, the building appears as two appendages.



127. Outline of domed building resembling that of Palladian window.

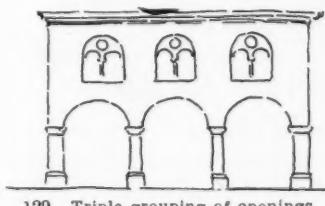
As for the grouping of openings and groups of openings upon the building, a vast field opens before us.

Upon a single mass, a very good design may always be made by care in arranging the openings; many designs are nothing more (128).

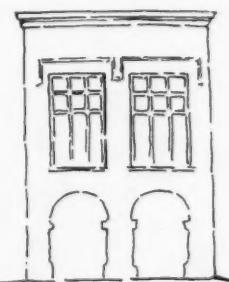


128. A design composed of one opening in the first story and two in the second.

Three openings above, and three below, as here shown (129), always make a good design. So would a single tier of three openings, but it is so simple that mere mention suffices.

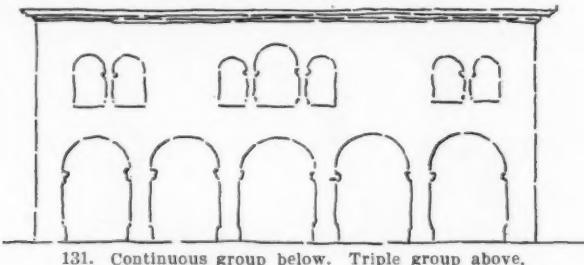


129. Triple grouping of openings.



130. Double grouping of openings.
This verges upon "double composition." The label over the windows should carry through.

Two above and two below will also make a design (130), although the danger of "double composition" must be avoided; and there are innumerable other compositions of openings alone, such as figure 131, which give perfectly satisfactory designs.



131. Continuous group below. Triple group above.

But the important difference in the grouping of details is this: that while subordinate masses seldom, and principal masses never, are arranged in continuity, the continuous arrangement of details is required quite as often as that of individual grouping.

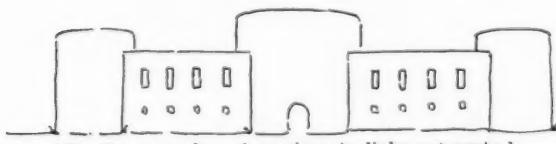
When we come to the consideration of subdivision we shall find the continuous arrangement predominating; but even in buildings in which the horizontality is not marked there are certain situations which demand the effect of continuity in the details.

These situations are those in which the indication of connection is needed, rather than of parts to be connected. Thus in 131 a continuous row of arches in the first tier forms a uniting base for a triplet grouping above; just as the lower mass of a principal grouping might form a base for three towers or three domes upon it.

For all linking masses, a continuous treatment of details is appropriate, and as long as they exceed three, whether the number should be odd or even depends upon circumstances; a central link,



132. Uneven number of openings in central link.



133. Even number of openings in links not central.

like 132, demands an unequal number of openings; but, where the link is not central, as in 133, four openings are better than three or two or one; better even than five, for the eye picks out the middle

one of an uneven number, and at once marks its individuality, which is what should not be marked in a lateral link.

It is one of the indications of the superiority of the æsthetic sense of the Greeks to our own, that their effortless perception of odd and even extended to so many more things than does ours. A Greek took as much care to put fourteen or sixteen or eighteen intercolumniations on the side of a building, in order to avoid a central opening, as we take to put the door in the middle of a room.



134. Design for Soldiers' Home, Minneapolis, Minn. L. S. Buffington, Architect. Grouping of windows. Triplet windows in mass. Four windows in appendage.

And that may remind us that another place where it is important to have an even number of details, windows or otherwise, is on the side of the building; and still another place is on all appendages. In figure 134, the composition looks much better with four windows, in the appendage to the big tower than if it should have three or five. As an example of what can be done in the way of recon-

ciling antagonistic conditions in the arrangement of openings, look for a moment at figure 135, a Greek monument. The designer



135. Outline sketch of Greek monument.

wanted to have his door in the middle, also to have the statue on top in the middle, also to have a pier under the statue for constructive reasons and to satisfy the constructional instinct.

Impossible, manifestly, to do all, but he does the best that he can with it. The central pier he makes as slim as the eye will tolerate; the side piers comparatively massive, making the inevitable two openings one as much as possible.

The statue on top is in the centre, in no danger of breaking through, with the central pier under. But, over each side pier, the designer has put a heavy square block, adding to the importance of the flanking piers and minimizing that of the central strip.

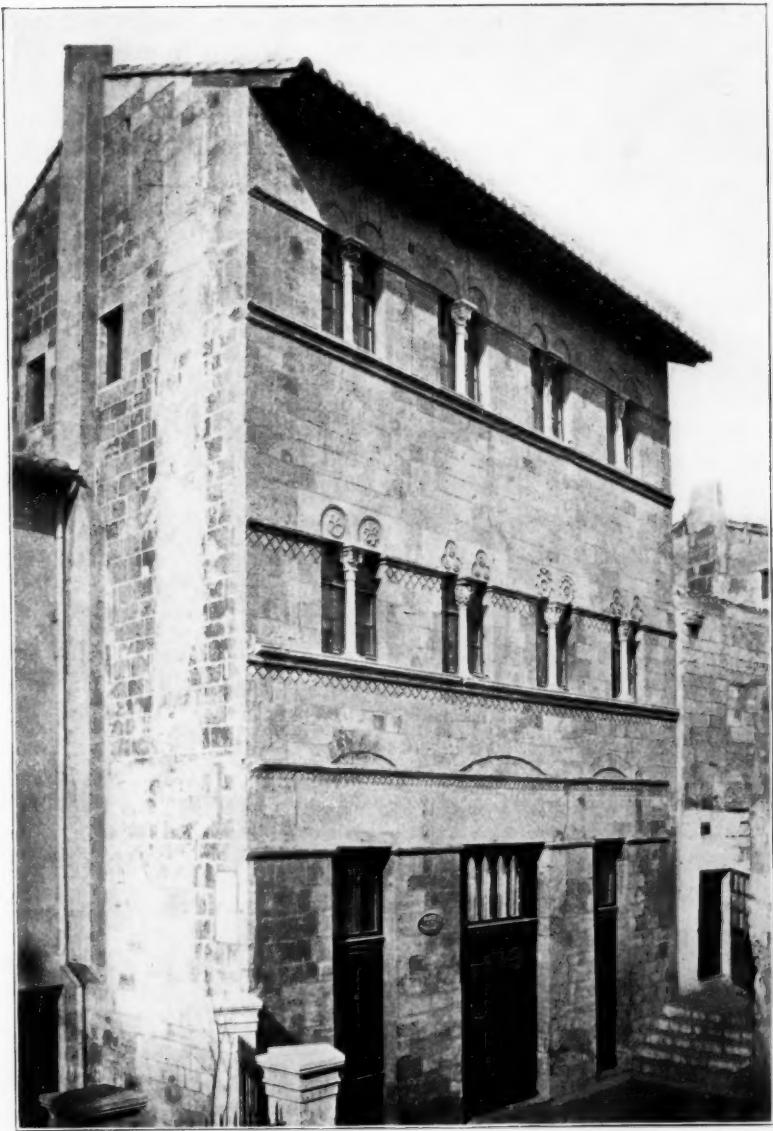
So much of the general arrangement we can penetrate; the methods that enabled the Greek to make everything just right in relative size, we have not yet penetrated.

VII.

Horizontal Subdivision.

We now approach the second grand division of architectural design, that of subdivision into horizontal parts. Just as the vertical subdivision, which we have called grouping, is effected by the advance and retreat of different parts, and the shadows thereby produced, horizontal subdivision is effected by means of mouldings, and the shadows cast by them.

Mouldings are, doubtless, incidentally useful for mechanical purposes—for shedding rain-water from the face of the building, for bonding or leveling courses, or the like; but aesthetically we are to regard them, as a painter his brush, as means whereby we may draw lines where we want them.



136. Romanesque House, St. Gilles, France. Showing the unifying effect of a single large cornice.

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Another means of separation horizontally, is by varying treatment; that is, by differences in the size and shape of the porches, windows, doors, and other objects placed upon the building.

It is in the predominant use of horizontal lines that the classical and Renaissance work is radically distinguished from the mediaeval. It is natural and proper that one or the other, either vertical lights and shadows, or horizontal lights and shadows, should predominate. Where a building is composed of many parts standing side by side, it is quite instinctive to avoid running heavy black lines around all the ins and outs.

Such lines as there may be, must be light, not comparable at all with the vertical lines. On the other hand, whenever, by choice or necessity, we are limited to a square, flat mass, we as instinctively construct horizontal lines across it.

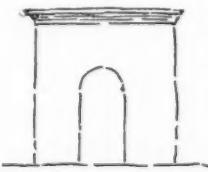
Given a box, into how many parts must we slice it to make it look well?

All of the first three formulas apply, as far as the new conditions admit of their application.

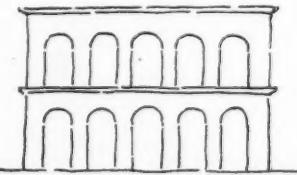
In the first place; one thing looks well.

Mark our box by a big black line at the top, 136; or put some one thing, door, or arch, or window, or memorial tablet, or what not, upon it; or, if possible, do both, as in 137, and it is sure, so far, to look well.

In the second place, in horizontal subdivision, two equal things, of similar treatment in detail, do not look well, 138. The reason is probably analogous to that which requires an individual member of a group to be symmetrical in itself. Although symmetry in a group is not necessary, in a single member it is usually essential.

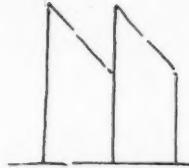


137. A single cornice and a single detail.

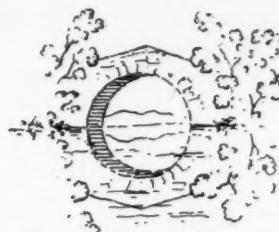


138. Ill effect of similar equal double subdivision.

For in each member of a group the important point is that it be distinguished as an individual, and an unsymmetrical mass appears to the eye but half an individual, as in 139. Now it would seem that two tiers of arches, just alike and placed over each other, as in 90, owed their unsatisfactory appearance to very much the same cause. It is at least certain that if vertical symmetry were constructively possible, it would be as pleasing as horizontal symmetry, as we may observe whenever we see a clear reflection in the water, 140.



139. Corresponding ill effect of similar double group.



140. Pleasing effect of vertical symmetry.

It is not possible for us to build reflections so, when we are obliged to cut up our mass into two parts, we must do the other thing, and make them as different in treatment as possible, that

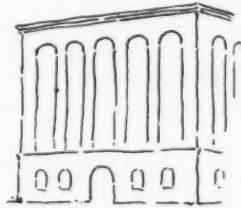


141. Two equal parts differently treated.

there may be no such close resemblance as to seem repetition. We may make our top part with vertical columns and delicately graceful arches, and our bottom with horizontal rustications: anything to make them different (141).

But where the two parts are unequal there is no such difficulty. All gable treatment where the line between the gable and lower part is marked by a moulding, is double; but the gable is intrinsically so different from the square part below, that the treatment is a sort of self-acting treatment, and carries itself out without much effort on our part.

We may have a large lower part, and crown that is less, or we may have a low bottom part, and a high top, as 142, either is capable of looking well, if properly carried out.

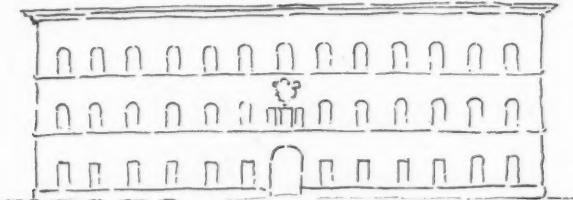


142. Two unequal parts.

Three things look well together when placed on top of each other, whether equal or unequal; but if equal, only when the unity of the

whole composition is asserted by some further means, precisely as in vertical grouping.

In the Farnese Palace there are three parts, substantially equal, as in figure 143, separated by lightly drawn lines, marked by rows



143. Sketch of Farmese Palace, three equal parts.

of windows of a general similarity of appearance. It would be unsatisfactory, were it not for the broad, dark line across the top, which makes it all one.

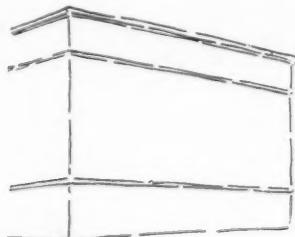
And this is why, in spite of the protests of those who maintain, and justly, that ornament should not be constructed and stuck on, and that one material should not simulate another, the tin cornice maintains its place of honor in city buildings.

City buildings are almost always single masses, and flat-fronted; the simplest way,—not the only way, but the way that requires least effort on the part of the designer,—the line of least resistance, so to speak,—is to draw a big moulding, for that is what it is, across the top. To the mind it is offensive, even when made of stone, to pile up a useless mass, perilously poised; but to the eye it is so satisfying as to counterbalance, more or less, the intellectual objection.

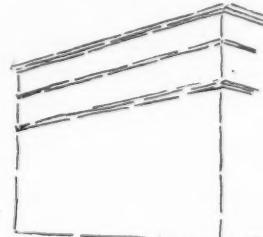
When we come to three unequal parts, we are in free pastures.

We may cut up a building in almost any way, as long as it is into three unequal parts, and can hardly fail to achieve a good result, with respect to the number and size of parts, if we can do as well with the rest of the treatment.

Just as in the case of vertical massing, and for a like reason, the largest must be in the middle, 144. The reason is that if it is not in the middle, the two smaller parts hang together, as in 145, and it resolves itself into a two-part division, one of them being itself



144. Three unequal parts, the largest in the middle.



145. Three unequal parts, the largest not in the middle.

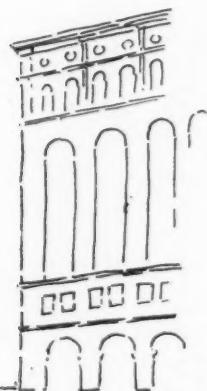


148. The Woodbridge Building. Clinton & Russell, Architects, William Street, New York City. A five-part subdivision.

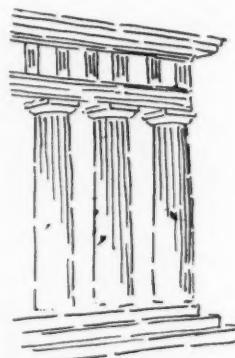
compounded of two parts, which is, indeed, quite manageable, only not so easily managed as a three-part composition.

But if we keep the middle part the largest, we can hardly go wrong; and, after that, we may subdivide the upper and lower parts, but the larger and intermediate part, never; except by lines comparatively light, and excepting, also, the continuous treatment of which we are yet to speak.

This is why it is so natural to put a row of long piers, as the main middle motive, as in 146; and it is the reason, too, why the classics



146. Large middle part formed by piers.



147. Large middle part formed by columns.

fluted their columns, to absolutely deny any subdivision at all to their big middle part (147).

Here, 148, is a five-part division, the same as 146, only divided somewhat differently. And we may carry the process further, and subdivide the top and bottom parts in various ways, but the middle part must be kept undivided.

Beyond three parts, either simple or complex, as we have just said, there is the continuous arrangement of many equal parts over each other, with top and bottom parts added.

Such is the way that the Leaning Tower at Pisa is done, and many Chinese pagodas; and the same thing may be done where any high building or tower is to be treated; but there must always be a top part and a bottom part; the continuous treatment must be for the middle part only, and even then the equally-spaced lines must not be too strong, nor the parts fewer than four.

So our first rules stand, for horizontal as well as vertical separation, with such modifications as we have described.

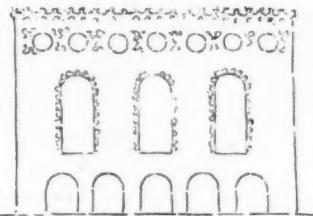
Next we come to a region beyond the range of rule, because new and hardly to be reconciled conditions prevail.



149. The Gillender Building. Berg & Clark, Architects. A tall office building subdivided into five parts.

We have spoken, so far, of subdivision by mouldings alone; the last few examples, showing some windows and enrichment, bring us to the question of subdivision by treatment with other details.

It is possible to subdivide a building, even without the aid of mouldings, by such means. In figure 150, for instance, rows of



150. Subdivision by treatment without mouldings.

differently sized and differently disposed openings indicate the different horizontal parts; and the enrichment between the seven top openings, joining them into a band, to a great extent takes the place of a cornice.

But this result has been reached by a method not always constructively practicable. One of the first dicta of ordinary practice is that piers must be above piers, and openings above openings.

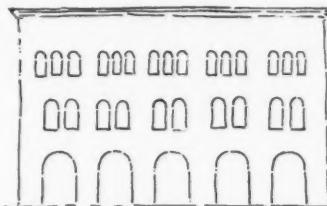


151. S. Maria della Pieve, Arezzo, Italy.

The reason is partly constructional, as it is known that lintels will crack and arches will fail, with too much concentrated weight upon them; it is, besides, partly æsthetic, being exactly the same feeling that led the Greek designer to put his pier under the statue, be-

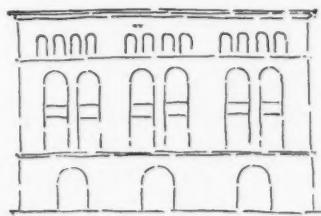
cause, even if his lintel were of iron, a statue would not look comfortable thus suspended.

So that there is really no complete solution. The conditions are irreconcileable. A strongly marked horizontality is aided by rows of openings that are not over each other, so that the eye does not find any line by which it may ascend; and the mediævals have left buildings done thus, as in 151, where there are five, thirteen, twenty-five and thirty-two openings in its four tiers, respectively. The horizontality sought is obtained; but the æsthetic objection to false bearings still exists, though minimized; and the constructive objection too, although apologies may be made for the arrangement on that score. Altogether the system of irregularly spaced openings is certainly more graceful where continuous horizontal effect is sought than the system of piers carried through; yet in most cases we are obliged to use the latter, as in this sketch 152.



152. Variation of openings in spite of the continuity of the piers.

Even with this limitation much may be done in the arrangement of openings to aid the effect of mouldings. In figure 153 the main piers run through, but the horizontal bands are marked by the difference in the number of openings in each bay.



153. Variation of openings with continuous piers.

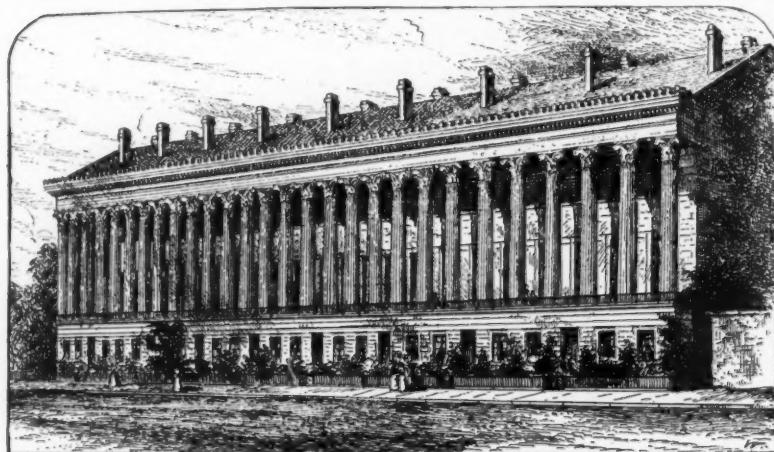
Observe, in the top member, how much the effect of a continuous band is increased by making the small windows four instead of three, although the number of groups of openings is three unavoidably.

Observe further, that in order to make our middle part larger than either the top or bottom, indeed, in order to obtain a middle

part at all, in this four-storied building, we have been obliged to unite the second and third stories under one tier of big arches. This united treatment of two or more stories is often necessary in modern many-storied buildings; and is objectionable only when the detail used for the purpose is inappropriate or exaggerated.

And it is in this that the convenience and availability of the "orders" lie. With the aid of rows of columns of assorted sizes, we can always run a tier through two or three stories, 154, and most effectively and gracefully make them one mass for the requirements of the eye; with the additional advantage of the most delicate and perfect detail, sublimated by the study of centuries.

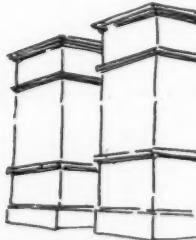
That some such expedient should be devised, the many-storied



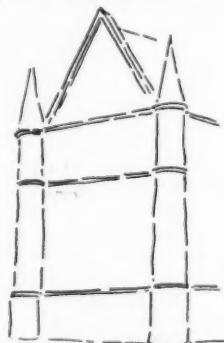
154. Row of houses in Lafayette place, New York. Two stories united by a colonnade.

buildings of modern times required; nor is the vitality of the style remarkable, when we understand how very fit it is to survive.

Bear in mind always that, as we have said, a building should not have many marked vertical parts and many marked horizontal parts at the same time. A series of heavy horizontal bands carried



155. Ill effect of heavy mouldings carried around strong vertical divisions.



156. Good effect of light horizontal lines upon strongly marked vertical parts.

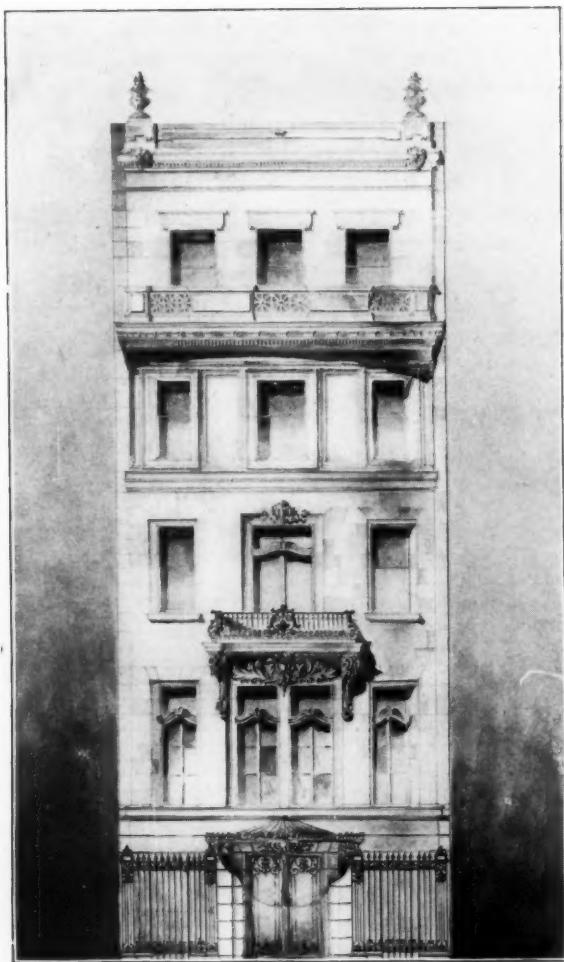
around a series of narrow masses never looks well; nor even a single cornice so used (155).

Invariably, upon comparatively narrow and high parts, rather light lines of mouldings are best used, 156, and the heavily marked horizontal divisions kept for comparatively broad and straight fronts.

Just the same rule prevails in the subdivisions as in the masses. After we have determined upon our row of columns or piers as our middle motive, we must beware of blocking or banding them in any way. And after we have arranged the horizontal lines of our rusticated basement, we shall do well not to break it around the piers, or, if there must be such breaks, to let them be of not too great projection, nor otherwise interfere with its horizontal lines.

For all of this judgment is required, and that delicacy of apprehension which we call taste; to a great extent obtainable by cultivation, that is, by looking at things with the view of judging whether their appearance is pleasing or not; but, in its extreme degrees, inborn, like extreme degrees of other faculties, musical and poetical apprehensions, and even mechanical and mathematical.

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BOOK REVIEWS.

THE ECCLESIASTICAL ARCHITECTURE OF SCOTLAND FROM THE EARLIEST CHRISTIAN TIMES TO THE SEVENTEENTH CENTURY. By David MacGibbon and Thomas Ross; Authors of "The Castellated and Domestic Architecture of Scotland," Vol. III., pp. xiv.; 649. Edinburgh: David Douglas. 1897.

The work named above has now, at the close of last year, reached its third volume, the preface of that volume being dated October, 1897. A previous notice in No. 21 of this journal, has dealt with the earlier volumes. This book is the result of the joint labors of the same faithful students and admirable exponents to whom we owe the Castellated and Domestic Architecture of Scotland, which was completed in five volumes in 1892.

The newer book deals with a subject which is far more familiar to the student; because, as, indeed, the authors say in their preface, "the various styles and periods of Gothic architecture, both in this country and abroad, have for long been carefully investigated and defined." It is not to be supposed, however, that the buildings here treated are all, in any strict sense, Gothic in style. Although ecclesiastical architecture retained in Scotland as well as in England, traces of Gothic feeling at a time when the rest of Europe had abandoned the mediaeval styles altogether, yet the XVII. century brings us to buildings whose mediaeval character is but slightly marked and has to do with details even as extensive and important as are large tombs, porches, towers, and the like, in which there cannot be said to be any Gothic feeling at all. In the three volumes of this work there are nearly as many pictures as in the five of the earlier work; and they are of the same general character as those which have been praised not more than they deserve in the previous notice. If they are somewhat less spirited the cause of that may be in the more complicated character of the buildings. The text, on the other hand, rises to a high excellence of historical demonstration, as is natural in a case where with equal knowledge, equal critical faculty and equal care the subject treated is larger and more attractive. It must be said in the plainest way that nowhere

in the English language is there a better piece of historical and critical work in the department of architecture. It is certain, too, that the great continental treatises, with all the labor and pains that have been spent upon them, and the comparative thoroughness of the archaeological research which has preceded them, can seldom rank with this one in useful and interesting presentation of the subject. In fact, we have in this book, a model study of its kind; that is to say, a general study of the whole architectural wealth of a kingdom, not, indeed, of the first rank in wealth or in architectural splendor, but not on that account the less worthy of investigation. To apply such a method to France west of the Vosges, and north of the Cevennes—or architectural France proper—would require, no doubt, one hundred such volumes and a lifetime of two diligent students; and, therefore, it will not be done.

It is to be observed, too, how skilfully the contents of the book have been fitted for the task in hand. The study of any one great monument carried out in large-scale measured plans, and elaborately drawn elevations and sections, with photographic views and enlarged details, would equal in cost the preparation of all these volumes together. Such work as that must be left to makers of monographs, and their easier, if more elaborate, work is to be encouraged in every way. To ask, or to expect, any such treatment of the buildings in a general treatise like the one before us is to show ignorance of the conditions under which such work is done. There is really nothing to be said of these books that is not in their praise.

THE CASTLES OF ENGLAND: Their Story and Structure. By Sir James D. Mackenzie, Baronet, of Scatwell and Tarbat. With forty plates and fifty-eight text illustrations and seventy plans. In two volumes. Vol. I., pp. XXII., 475; Vol. II., 448. New York: The Macmillan Company, 1896. \$25.00.

To architects and students of architecture this book is valuable chiefly for its illustrations. It contains about forty full-page plates of photographic process, representing some

buildings of primary importance, such as the Tower of London as it is seen from the river, the Keep of Rochester Castle, St. George's Chapel at Windsor, Kenilworth Castle, Newark Castle and Bolton Castle, and also minor structures which are yet very interesting in their architectural character, such as Dunster Castle, Compton Castle, and the following, namely: Hoghton Tower as seen from within the court, and Skipton Castle, viewed in the same way from within. In addition to the plates, there are, as the title page tells us, 158 half-tone pictures in the text, some of which are as large as the plates themselves, and, in addition to these, 70 plans. These plans are a disappointment because they are small and of the kind often furnished by guide-books, and show, in no instance, perhaps, any special research into the probable original structure. One apparent exception must be noted. It is in the first volume, at pages 76 and 77, where the great fortified palace of Hurstmonceux is explained by two plans taken "from an old drawing." Indeed, the text makes no claim to represent or describe the results of any archaeological researches. Documents, indeed, have been consulted, and a history of each separate structure is given at some length. One learns how Castle Rising, for instance, is located on ground which was once at the very edge of the sea, as is set forth in the old stanza here quoted.

"Rising was a sea-port town
When Lynn was but a marsh;
Now Lynn it is a sea-port town
And Rising fares the worst."

How Roman and British work is recognizable in the fortress, how it was dealt with in its early state of being by the Conqueror and his followers and their successors, how its special tradition is that it was the prison for twenty-seven years of Isabella, Queen of Edward II., "the she-wolf of France," as Gray calls her, where, however, she was by no means strictly confined, for, as is here shown, the Castle was her own property and she lived there, and sometimes elsewhere, with great state and ceremony. One of the large pages is occupied by a description of the building which is likely to be of use to any student of historical domestic architecture, or of fortification treated historically. A small and very general plan, on page 298, of the first volume shows the ancient earthworks of Castle Rising, of which very important traces remain, fortunately not too much marred either by time or by wilful destruction, and the keep, chapel and minor stone buildings are also laid down. There is, moreover, one half-tone print showing very effectively the half-ruined keep, with traces of

the minor buildings not all shown on the plan. This example will explain quite sufficiently what the general value of the book is to students. It offers no analytic account of the buildings nor any minute description of their details, nor does it make any pretension to be the result of special researches. Indeed, the instances are few in which an English civic building has been made the subject of careful researches, at any time since archaeological study began. What this book offers, then, is the record of a very great number of ancient fortified residences, small and large, divided under the three heads, "Chief," "Minor," and "Non-Existent," and these arranged under the different counties, but referred to by a sufficient index. A table on page xxiii. sums up the number of buildings treated as 112 "Chief" Castles, 277 "Minor," and 271 "Non-Existent" buildings, in all 660. This, it will be seen, is no small promise to the student. If he does not receive from this book the immediate help which he earnestly desires, at all events the book contains a classified and organized catalogue of a vast number of important structures, and the bibliography, which occupies seven pages, and is also divided according to the countries, gives him the means of readily increasing the sum of his knowledge.

MODERN ARCHITECTURE.—A book for Architects and the Public. By H. Heathcote Statham, Fellow of the Institute of British Architects, Editor of "The Builder," Author of "Architecture for General Readers," "Form and Design in Music," "Changes in London Building Law," Etc. With numerous illustrations of Contemporary Buildings. Pp. x; 281. Charles Scribner's Sons, New York. 1898.

This is the first attempt it would seem to pass in review the subject of modern buildings, that is to say, of the buildings erected during the second half of the nineteenth century. It is fortunate that the first attempt should have been so intelligent and instructive. The field is so very large that none can feel sure that he has examined every part of it. The most suggestive buildings, if they are small and it no advertising dodges have been resorted to, may be ignored by the architectural journals and the supply of photographs of recent buildings is intermittent and very uncertain. Ancient buildings become known, and these are catalogued and ticketed, and the student is able to get access to every record in such a way that comparison among them is possible. The writer of criticism may, with reasonable care, be sure that he is using adequate examples of the truths he wishes to insist upon. With contemporary buildings the case is obviously dif-

ferent, and this is why Mr. Statham's position as editor of the (London) "Builder" and at the same time a practicing architect of experience, enables him to produce a book of singular completeness. He has used his knowledge of the accepted material even to the extent of giving designs not carried out. This is important; no really adequate history of modern architecture can reject these designs. Often it happens in our benighted system of competition that admirable designs, full of spirit and movement, are thrown aside, while inferior ones are selected. If it were a question of enlarging this book to ten volumes quarto, which is what a sufficient history of modern architecture would run to, the experience of every great city and architectural centre would furnish many instances of such wasted architectural ability. The book before us is small, and it is evident that only a few examples, comparatively, could be given in it, but the completeness lies in these being well chosen for the purpose which they had to fulfill.

In one way the book is depressing. It points to very few instances of originality of conception. The Clerkenwell Church, by Mr. Sedding, shows classical forms treated freely, and that is a thing we have been waiting for anxiously. The Brussels Palais de Justice, by Mr. Poelaert, is a singular and questionable but most interesting development of a similar spirit. Buildings of mediaeval spirit, but of novel treatment, and those, which the last twenty years have seen put into shape, of Renaissance or later design, but picturesque in treatment with high roofs and a tendency toward towers and lofty dormer windows, are included in Mr. Statham's record, and full justice is done them. Especially to be liked is the spirit of his remarks upon the Gothic Revival in England, its tendency and its results. In this we have the words of one who is neither the enemy nor the advocate of that movement, who sees the impossibility of its success along the lines laid down for it, and who does justice to the good work, and to the work which is not so good, of its ardent advocates.

Americans will feel that the examples given of American work are not always the best that might be chosen—but is there any known means of satisfying the people of one country by a foreigner's treatment of their productions? An American with a very large collection before him of views of his countrymen's productions might make a stronger choice, and yet he might easily make a weaker one.

The book consists of five chapters devoted to such divisions of the subject as Church Architecture, Street Architecture, etc., with a final "Note as to the Influence of Iron." It has an

index which seems well made. There are 145 illustrations, generally small, but well calculated to tell their story and seldom forming blots on the printed page. The book should be read by every one, as it cannot fail to aid greatly in the desirable improvement of the public appreciation as to the difficulties and the possibilities of modern architectural design.

DECORATIVE HERALDRY: A Practical Handbook of Its Artistic Treatment. By G. W. Eve. London: George Bell & Sons, York St., Covent Garden; and The Macmillan Co., New York. 1897. \$3.50.

Heraldry occupies a curious position in America. The dictionaries which include technical terms have found it necessary to give the terms of heraldry with great fullness and there is a disposition to use armorial bearings in book-plates, and, to a less degree, in architectural decoration. On the other hand the proper use of such bearings is not common, and even an attempt to ascertain one's rightful arms or to assume an escutcheon properly marshalled and good in heraldry is so very rare that such attempts can hardly be said to exist. Escutcheons and crests with their lambrequins and mantlings are used as if they were the flowers of the field for elements of decorative design. A room of German Renaissance decoration is not considered complete without the escutcheon of robber barons somewhere in its decorative glass or in the carvings of its chimney-piece, and yet the mediaeval speculator in other men's goods would find it hard to recognize his own achievement or to select it from among the others, so much are they misconceived and misrepresented by the modern workman.

It is always possible that a real interest in heraldry as furnishing the distinctive mark of a family and of the position of the individual in a family may develop itself. This may happen at any time and most unexpectedly. It is far more probable, however, that heraldry will continue to be what it is now—a decorative appliance. This is, perhaps, regrettable, but if heraldic decoration is to be used in this way it should be used with intelligence, and the book before us is likely to aid students very greatly in this respect. For the proper scientific use of bearings and tinctures and the proper marshalling of an escutcheon the designer must go to the grammars of heraldry, which are numerous, and which, though not ideal in their arrangement, or their literary style, can be trusted to teach the pseudo-science aright, but for the decorative display in sculpture or in flat pattern of the devices of heraldry such

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a book as Mr. Eve's has been needed. It is not in buildings of the Gothic styles alone that heraldic decoration is in place; it is equally the affair of XVII. century architecture, nor would a cardinal or a prince even of the XVIII. century have been inclined to relinquish his sculptured escutcheon or the tapestry in which his whole achievement was displayed. Moreover, there must be some way of redesigning the heraldic bearings that they may be in harmony with modern design, and, indeed, some few attempts not unsuccessful have been made in that direction.

All of these truths are well set forth in the book under consideration whose chief fault is that it is not large enough to contain all the matter which it would be well to present. At the same time, one has to protest against the use of the valuable space for the discussion of Egyptian, Sassanian and Persian emblems, which are, in no true sense, heraldic at all.

A BOOK OF STUDIES IN PLANT FORM, with Some Suggestions for Their Application to Design. By A. E. V. Lilley and W. Midgley. New York: Charles Scribner's Sons. 1896.

It has been a truism, ever since people began to talk and write about decorative art, that pattern designing was a thing of the past, so far as Europe was concerned. Persons whose duty it was to make drawings for wall papers or textile fabrics, or for borders and patterns to be painted on walls, have, for fifty years, simply appropriated the designs made by the men of old times for totally different purposes; and the more intelligent and ambitious have tried to found new designs of their own upon the work of the ancients and have really fancied that they had reached originality. There is, at last, an evident reaching out for better things. There is something very interesting in the attempts which are now being made to produce quite novel patterns by the conventionalizing of such refined natural forms as plants can furnish. This is not the hard "foliation" which the Gothic revivalists of fifty years ago indulged in. That work, as offered the public by Owen Jones, the younger Pugin and their followers, consists in taking a group of leaves, pressing them flat and then taking all possible life out of them by making the leaves and leaflets on one side of the group the exact counterparts of those on the other. It was the attempt of those would-be revivalists of mediaeval decoration to turn natural forms into ornament by divesting them of all play, of all variety, of all movement. The modern designer of the better sort is in search of a very different result.

Some few of the modern specimens of commercial book-binding have afforded very interesting surface patterns studied rather closely from the vegetable forms and yet full of originality, individuality and charm. Much of that merit is to be seen in the designs contained in this little book. Moreover, not only are the designs themselves often of interest, but careful drawings made of the natural plants are also of considerable possible utility to the student as suggesting at once by their natural forms other combinations.

This suggestion may really be more forcible when made by a drawing than when offered by the plant itself. Pierre Victor Galland has left it on record that his decorative design came the most easily when he hung up in his studio his own large drawings from nature and worked with them, and not with the natural object in his eye and in his mind. Every practiced designer will know what this means and will realize that the human presentation of plant form may suggest to humanity a practical use of that form in further developments.

LIVES OF SEVENTY OF THE MOST EMINENT PAINTERS, SCULPTORS AND ARCHITECTS. By Giorgio Vasari. Edited and annotated in the light of recent discoveries by E. H. and E. W. Blashfield and A. A. Hopkins. New York: Charles Scribner's Sons, 4v.; \$2 each.

Vasari's "Lives" is one of the few certainly immortal works in the literature of art. There are, indeed, not many classics in that department, and assuredly there is none that maintains so lively and friendly an intercourse with all sorts of men, generation after generation, as the "Lives." Modern research and criticism have made sad havoc of Vasari's facts, so that there is scarcely a page that does not require correction or amendment; his artistic insight, moreover, was not deep, and his appreciation, though lively, not profound—yet his book survives, still vital, after the lapse of more than three centuries. Undoubtedly Vasari owes much to his period—for all subsequent ages, Italian art of the Renaissance must be of supreme importance. The Aretine lived when our world was young, a witness, as it were, albeit a late comer, of the creation from which our art is so consciously derivative. There are moments in human affairs when mere contemporaneity is a happier circumstance for a writer than a later wisdom or a profound philosophy speaking from afar. How many exhaustive modern art histories would not the world give for the writings of a busy gossip of the Periclean days. Vasari is not, for his particular time, exactly such a

person, but he is somewhat a tattler in the better sense of the word, and the world, we see, has ever dealt kindly with these talkative historians of the hour. The perennial interest of the "Lives" is due in large measure to these circumstances, but not to them alone. In spite of failings they are still original documents of a precious sort, and they possess intrinsic charm and interest, good-nature and honesty, impartiality and sympathy, which have not contributed a little to their long preservation. To be valuable, however, to most readers, the "Lives" require a minute, critical commentary. As already said, scarcely a page can be left untouched. German, Italian, French, British and American scholarship have long been busy with the Italian Renaissance, and the fruits of this research must be read into Vasari if the "Lives" are to retain authority for the ordinary reader. The performance of this vastly useful work was the task which the editors of the new edition undertook. They retained Mrs. Foster's well-known English translation, and in order to make room for a "relatively complete annotation" selected seventy of Vasari's biographies for critical treatment. The selection made may, no doubt, be questioned in part by the special student, though in the main from the general point of view the choice decided upon is judicious, but the critical apparatus supplied by the editors is so entirely excellent that any small objection to the selection would be frivolous. No more conscientious and thorough piece of work than theirs has been done recently. It is of the highest quality, and follows the text with a closeness, minuteness and lucidity which is hardly to be overpraised. It renews Vasari, and renders this edition of the "Lives" indespensable to every student and lover of Art.

THE RUINS AND EXCAVATIONS OF ANCIENT ROME.—A Companion Book for Students and Travellers. By Rodolfo Lanciani, D. C. L., Oxford, LL.D., Harvard. Professor of Ancient Topography in the University of Rome, Author of "Ancient Rome in the Light of Recent Discoveries," "Pagan and Christian Rome," "Forma Urbis Romae," Etc. Pp. xxiv.; 619. Boston and New York: Houghton, Mifflin & Co. The Riverside Press, Cambridge. 1897.

This book is a marvel of compact information concerning a subject which is most interesting to all students of classical architecture, of ancient sculpture and the tremendous epoch which we call the time of the Roman Empire. The author's previous works, "Ancient Rome in the Light of Recent Discoveries," and "Pagan and Christian Rome," may have led the

reading public to expect another book made on the same lines, that is to say, a collection of essays detached and made mutually interaiding, essays on special topics connected with the Imperial City in its greatest epoch and at the time of its first passing into decline. Such, however, is not the character of the book before us, which is rather a guide-book to Rome as it can now be visited and studied, the information being grouped according to a topographical division of the city—the Palatine treated apart from the Forum or the Sacra Via, the Esquiline Hill or the Walls. The preface states that the author has not intended to produce "a complete manual of Roman topography," but that, of course, a book ten times this size could not be. In this volume, however, containing about as much matter as Murray's Handbook for Rome and rather less than Gsell-fel's Handbook, there are treated the Tiber and its bridges and the ancient works near its mouth, the walls and gates, the buildings on the Forum, the great buildings about the city of which new parts have been discovered, and the other buildings only less great which have of late been properly located for the first time, the vestiges or records of buildings now wholly destroyed and the works of painting and sculpture which recent investigations have brought to light. The information given about well-known buildings in Rome and confirmed by illustrations taken from drawings by the early explorers of the Renaissance time will have much in it to surprise even the architectural student unless he has made a specialty of Roman topography. Such a body of information there is concerning the Praetorian Camp; and again concerning the Arch of Marcus Aurelius, of which a drawing is given in facsimile. Again, a drawing of the tepidarium of the Baths of Diocletian is given, dating from a period before the restoration of these halls into their present form as the Church of St. Mary of the Angels. Vestiges of the prow and stern of that singular ship of Aesculapius into which was cut and built the Island of the Tiber, are given in the first chapter; and the last chapter gives studies of Hadrian's Mausoleum, its ancient details and the order in which were placed the Imperial commemorative slabs. Throughout the book, at every pause after the description of an important monument or region, a brief bibliography is given by which the student may find immediately where further information is to be had. Maps and plans are given where needed and are of great value, and the reader is reminded from time to time of the great general map of ancient and modern Rome which the same author has published and which is now, at last, complete.

There can be no more sad or disheartening study than such a record as this of the brutal and senseless destruction by barbarian conquerors carried on and even surpassed by the men who thought that they were cultivated and studious. A curious habit of the present age which excites the wonder of everyone who thinks about his own time, its habit of admiring ancient works of art sincerely and then "restoring" them out of existence, is matched by the habit of sixteenth century and seventeenth century popes and cardinals of admiring newly discovered classical works so much that they could not refrain from breaking them to pieces and using the fragments for work of their own. Thirty years ago when the Western world began to be interested in Japanese works of art, it was said of a great lady—a European sovereign—that she admired Japanese bronze vases and collected them; that she took the handles for paper-weights, the bodies for flower pots and the bases, turned upside down, as saucers for the same pots. In this way all the requirements were supposed to be fulfilled; the foreign work of art was domesticated, so to speak. Much in the same way the art lovers of the sixteenth century admired Roman remains. The Triumphal Arch was splendid indeed; it was, however, highly expedient that a certain street

should be straightened or widened; therefore let the Arch be torn down and let the sculptured slabs be conveyed to some papal palace or given to some princely house which would undoubtedly take care of them. The hall of some thermae was magnificent, with its granite shafts still in place and the sculptured friezes above them; therefore, let two of the columns be cut up into pedestals; let two others be given to the builders of a new church, and let the fifth perfect shaft be erected to our own glory at the corner of a neighboring street. The idea of preserving the work of art as it stood and for its own sake did not occur to the sixteenth century pope, or suggested itself only to be rejected. The same idea hardly occurs to the modern municipality; but the difference is in this, that the modern municipality restores the building out of its original character into something quite different, being as self-complacent the while, we suppose, as was the pope of the older time.

Note.—In Vol. VIII., No. 1, of this magazine, some illustrations were given (see page 68) of modern French work in Paris and elsewhere, for which we were indebted to that excellent architectural publication, the *Moniteur des Architectes*.

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